
Retail Privatization Options



Commonwealth of Virginia Alcoholic Beverage Control

January 10, 2011



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Table of Contents

Executive Summary.....	4
Introduction and Overview	9
Approach Descriptions	13
License Approach.....	13
Agent Approach	14
Economics of Privatization	17
Overview of Beer and Wine Distribution System	17
Price of Liquor.....	19
Agent Commissions	19
Wholesale and Retail Mark-Up.....	20
Consumption and Sales	24
Estimated Sales Outcomes from Retail Privatization	36
Impact on Sales and Revenue.....	41
Cost of Conversion.....	44
Up-Front Payment	52
Budget Neutrality	58
Overall Economic Model.....	67
Recommendations	70
Appendices.....	72
Appendix A: Bibliography	72
Appendix B: Technical Appendix	75

Executive Summary

Executive Summary

On November 8th, 2010, Public Financial Management, Inc. (PFM) – having worked with every administration of the Commonwealth of Virginia since 1987 – was retained by the Commonwealth to evaluate the fiscal and operational impact of two scenarios to privatize the 334 retail outlets of the Virginia Alcoholic Beverage Control agency (VABC).

The two scenarios presented for analysis were:

1. **License Approach:** Close all 334 VABC stores and replace them with 1,000 private retail outlets. The licenses would be held in perpetuity by the licensee and could subsequently be sold to a qualified buyer. The potential licenses would be restricted by population, size and type of retailer and within that same framework would be auctioned to the highest bidder for an up-front lump-sum payment.
2. **Agent Approach:** Close all 334 VABC stores and replace them with 1,000 retail outlets that would operate as agents of VABC. Under this approach, VABC would continue to set price, product selection and marketing strategy and agents would sell product at retail prices and deposit receipts (less an agent's commission) into VABC accounts. The agency opportunities would be subject to similar restrictions as the licenses and auctioned to the lowest commission bidder.

Under both scenarios, PFM assumed that the privatization would take place in phases over the course of roughly a year, with VABC store closings and licensee openings synchronized to maintain consumer access and stable gross sales.

Additionally, under both scenarios, VABC would continue to be the exclusive wholesale source for distilled spirits in the Commonwealth and would continue to operate the warehouse and distribution system to deliver spirits to retail outlets. VABC would charge a uniform wholesale price to retailers that would include the cost of the product, a wholesale mark-up and the current 20 percent State Excise Tax. PFM also assumed that the wholesale mark-up would be 50 percent, which would include the cost of distribution to retailers.

Under the License Approach, the sale of liquor to hospitality outlets for on-premises consumption would remain at the retail level. However, private retail licensees rather than VABC retail stores would sell to on-premise outlets and the private retail licensees would be free to negotiate price and delivery options not currently available to on-premises outlets. There would also be more retail locations available for sale to on-premise outlets under both the License and Agent Approaches.

During the month of November, the PFM team interviewed officials from VABC, as well as officials from the Department of Taxation and the Department of Planning and Budget (DPB). The team gathered extensive data on the current costs, revenues and historical information regarding VABC sales. Additionally, the team reviewed a number of previous reports on this topic, identified national sources of data and researched the experience similar states had with changes in state control of alcoholic beverage sales.

On December 1st, PFM provided a short preliminary presentation to policy makers on findings and progress. During the first two weeks of December, the analysis was refined and vetted with the operational agencies, data analysis was concluded and recommendations were formalized. This report reviews the analysis, conclusions and recommendations of the PFM team.

Through the analysis, PFM worked diligently to design an analytical framework that will permit policy makers to make informed and rational decisions. To do so, the team made a series of assumptions

designed to stabilize the variables in the analysis so that this framework could be devised. The major conclusions are summarized below:

Gross Sales Growth: Relying on the experiences of those with similar circumstances of increased competition and convenience (in this case, from tripling the number of retail outlets), economic data on personal income and other demographic factors, PFM forecasts that:

- Under the **License Approach**, gross sales would **increase an average of 5 percent** above the baseline growth that could be expected to occur organically. The growth would not be monolithic, with higher growth occurring in the Northern region and in the Tidewater area, offset by slower or no growth in the rest of the state.
- Under the **Agent Approach** gross sales would **increase an average of 2 percent** above the baseline growth that could be expected to occur organically. The growth is expected to occur regionally, as with the License Approach, but would be moderated by lack of competition and less aggressive marketing.

Price Change: Under the **Agent Approach**, there is no assumed change to mark-ups, taxes or fees. Accordingly, there is **no change in the baseline retail price**. In contrast, under the **License Approach**, there are an infinite number of possible price variations that could result from privatization. On any given day, in any given store, on any given item, the price could be significantly higher or lower than it is today. However, the PFM team's working assumption is that overall wholesale and retail mark-ups under license privatization will be, on average, about what they are today. By separating the current average VABC mark-up of about 69 percent into a wholesale increase of 50 percent, and a retail mark-up of just over 15 percent, we believe the resulting retail price structure **will average within one dollar per gallon of the current price**.

Up-Front Payments: Under the **Agent Approach**, there is no assumed up-front benefit as the nature of the auction process is designed to produce the lowest ongoing commission expense and all competitive considerations will be invested in that result. However, under the **License Approach**, the issuance design is intended to generate significant up-front payments. Since there are currently over 6,000 wine and beer retailer licenses in the Commonwealth, and only 1,000 distilled spirit licenses will be issued, only one in every six current retail wine and beer licensees will be selected. This selection process, coupled with the population and vendor type restrictions that create further scarcity as well as the fact that the license becomes the property of the owner in perpetuity, should create significant inherent value for which potential vendors will pay a significant one-time franchise fee.

The PFM team created two approaches to develop an estimate of what such payments might be:

- Using the gross profit assumptions based on a 15 percent retail mark-up and information from the retail industry, PFM created model business pro-forma for large and small liquor retailers. Based on these models, the team then applied a **blended multiple of the gross profits** of stores of as high as six times annual profit for large, high-volume outlets to as little as one and a half times for smaller stores, based on "rules of thumb" provided by the industry. This approach yielded a total of **about \$350 million**.
- Using a series of assumptions surrounding the operating margins of potential retailers, PFM derived possible net profit results from these operations. Using general information provided by commercial banks about the nature of financing up-front franchise fees, the team assumed that **half of net profit** would be **available to service the debt** incurred to obtain the license, and that the amortization periods would range from 5 to 20 years. Using this methodology and applying amortization periods of 20 years for large, high-volume outlets to as little as 5 years for smaller stores, resulted in an estimate of **approximately \$310 million**.

Given these results, and the approximately \$265 million initially estimated from the retail portion of complete privatization, PFM has assumed that **\$300 million is a reasonable expectation**. However, because of the small number of similar transactions to compare and the large number of assumptions made, the team believes there is significant risk associated with this estimate, which we believe to be in the range of \$100 million high or low. As a result, while greater variation is possible, we believe the receipts from carefully planned and executed license auctions are likely to fall **between \$200 million and \$400 million**.

Budget Neutrality: Extensive data research and analysis was done to isolate the current costs and revenues associated with the sale of distilled spirits. In consultation with VABC, DPB and the Department of Taxation, a baseline set of revenue and spending for FY 2011 was developed that is consistent with the data included in the Governor's December 17th, 2010 budget submission to the Legislature. This data shows a net benefit to the Commonwealth of just under \$325 million. To be "fiscally neutral", PFM determined that either scenario must, when fully implemented; yield at least an equivalent benefit.

Analytical models were constructed to translate the assumptions about gross sales volume, mark-ups, price, operational costs and taxes into fiscal terms. Additionally, based on information from VABC on the administrative process necessary to convert to a privatized retail system, transition models were created to forecast the costs and expenses of a system in transition based on the timing of stores opening and closing. This analysis included the approximately \$16 million value of VABC retail properties being sold, but excluded an estimated \$10-\$30 million in employee severance costs since the data was not available to accurately forecast how much of this expense would ultimately be incurred.

Based on the results of this analysis, PFM reached the following conclusions:

- Under the **Agent Approach**, the VABC fiscal benefit would be positive in the transition year and yield about \$39.71 million in additional receipts to the Commonwealth on an ongoing basis.
- Under the **License Approach**, the VABC fiscal benefit would be positive in the transition year, and yield about \$13.18 million in additional receipts to the Commonwealth on an ongoing basis.

Recommendation: Based on the preceding analysis, we make the following broad recommendations; earlier discussion and analysis should also be relied upon for guidance on more specific issues:

1. The choice between private retail stores or Agency stores is a fundamental starting point in the discussion and analysis. As noted earlier in the report, both systems are workable and in place in multiple states – in fact, there are four states that have a combination of private retail stores and Agency stores. While both systems have their advantages, our preference is for a system using private retail stores. We believe that system is best suited for making business decisions that best serve the needs of customers and provides the greatest opportunity to raise both one-time revenues through franchise fees and ongoing revenues through market-driven decision making.
2. There is also a fundamental trade-off in establishing the wholesale mark-up that will be retained by the Commonwealth. The higher the wholesale mark-up, the more revenue the Commonwealth will retain and deposit into the General Fund. Given that the VABC will continue to be the only available wholesaler, retailers will have to pay the mark-up regardless of the level and they will have to either raise prices or reduce their assumed return on investment. If prices are materially increased, it is expected that consumers will, in some combination, reduce their consumption, substitute beer or wine for distilled spirits or purchase out-of-state. If retailers reduce their expected rate of return on investment, the amount they will be willing (or able) to pay for a franchise will also be reduced. In some respects, it becomes a trade-off between one-time

revenue for transportation (which would suggest a lower mark-up) and on-going revenue for the General Fund (which would suggest a higher mark-up). Our recommendation, as noted in the model, is a level of mark-up that balances the need for on-going Revenue Neutrality with a desire to make franchises attractive enough to generate significant one-time revenue.

3. The process for implementing a new system will be labor-intensive, time consuming, and most likely, frustrating to all parties. It will require significant effort by public sector employees who are on the verge of losing their jobs, private sector businessmen and women who will have to adapt to a new set of rules and regulations, and state and local policymakers who may have divergent views on the advantages or disadvantages of a new system. To help ensure a smooth transition for consumers – and a reasonable return on investment for both the Commonwealth and its private partners, we would suggest that opportunities to expedite administrative processes, stage or phase in retail locations and transition current public store employees be considered. At the beginning, an expeditious process for conducting a franchise auction should be a key priority.
4. While beyond the scope of this study, the Commonwealth should also determine appropriate standards and benchmarks by which to judge the success of any privatization venture, clearly communicate those standards and benchmarks, and then gather, analyze and report on those performance measures on a regular basis.

Introduction and Overview

Introduction and Overview

The Virginia Department of Alcoholic Beverage Control (VABC) was created under the provisions of the Alcoholic Beverage Control Act, Chapter 94 of Acts of Assembly, Session of 1934. The Virginia Department of Alcoholic Beverage Control has continuously evolved during the past 75 years while the core aspects of the agency remain intact.

VABC is a public safety, regulatory and operational State department overseeing more than 15,000 licensed establishments that sell beer and wine to consumers off-premises, or serve beer, wine and spirits for on-premises consumption and that offer distilled spirits for sale, while also operating 334 retail liquor stores throughout the Commonwealth.

As a retail business, VABC currently offers approximately 3,400 alcoholic beverage products through its stores, which supply retail consumers as well as on-premise bars, restaurants, hotels and caterers. VABC's 690 full time and over 1,500 part time store personnel operate the retail outlets. About one third of the stores are open 7 days a week, and the remaining venues operate 6 days a week. The Department has contributed more than \$1.5 billion in revenue to the Commonwealth during the past five years.

Licenses and Licensing Overview	
VABC retail licenses (1)	16,913
New retail, wholesale and special-permit licenses	2,270
Licensed retail establishments	15,911
Private or corporate owners	12,273
One-day banquet and special-event licenses	17,077
(1) Inclusive of licenses for sale and consumption of beer and wine, mixed beverages, on-or off-premises.	

History of Privatization Efforts

Over the past 75 years, the issue of privatizing the VABC distribution and sale of liquor has been considered several times. These include:

- i. **1992 Price Waterhouse Report** – During the 1992 session of the General Assembly, two bills introduced the idea of privatizing liquor sales. Governor Wilder instructed VABC to conduct a study of privatization of liquor sales. DABC engaged Price Waterhouse to perform this study. The report examined partial privatization (retain wholesale, privatize retail) and full privatization (privatize both wholesale and retail). The report concluded that revenue neutrality was likely more attainable under a partial privatization model than a full privatization model.

Again in 1995,

- ii. **1995 DABC Report** – The VABC produced a 1995 report examining liquor distribution in Virginia and evaluating alternative service delivery models. The report examined partial privatization (retain wholesale, privatize retail) and full privatization (privatize both wholesale and retail) models. Partial privatization model options included licensed retailers, franchises, and commissioned agents. Full privatization models similar to the wine and beer distribution and retail systems were examined. The report reviewed operations in other states to inform its analysis and presented relevant data for information and context. No explicit conclusion was presented in the report; instead, the report aimed to inform the various characteristics and implications of privatization options.

- iii. **1995 Barsby Report** - Funded by The House of Seagram, this study sought to address options for a control state (Virginia) to consider privatizing distilled spirits operations. The study reviewed two scenarios for accomplishing privatizing: a revenue neutral option, and a price-neutral option. Under the revenue-neutral option, operations were assumed to be privatized with the goal to maintain the current net revenue to the Commonwealth from distilled spirits. In the price-neutral option, operations were assumed to be privatized with taxes calibrated to hold retail prices at the current average level. The study concluded that complete privatization (wholesale and retail) under the revenue-neutral model could result in an increase of average distilled spirits prices by as much as 44 percent. In addition, the study concluded that complete privatization under the price-neutral option, could lead to net revenues from distilled spirits declining by approximately 42 percent.

The PFM Team has reviewed these reports as well as more general material regarding distilled spirits privatization in Virginia and other states.

As part of the privatization effort, Public Financial Management, Inc. (PFM) was retained to conduct an in-depth analysis of the key issues facing the Commonwealth regarding retail privatization. This includes a review of two options:

1. Privatize retail functions by closing the existing VABC stores and licensing private-sector establishments to sell liquor for off-premises consumption. This approach includes:
 - a. Restricting the number of licenses, using population as the means to apportion stores throughout the state;
 - b. Using a four-leveled system of distribution that sets aside a specific number of licenses by type of store, based on overall square footage of retail space and linear shelf space for distilled spirits; and
 - c. Auctioning licenses by locality to the highest bidder based on established minimum bids.
2. Privatize retail functions by closing most existing VABC stores and authorizing retailers throughout the state to act as VABC's agent, operating retail sales on behalf of VABC for a commission. This approach includes:
 - a. Establishing a commission rate based on sales volume and/or type of sale;
 - b. Using a four-leveled system of distribution that sets aside a specific number of agents by type of store, based on overall square footage of retail space and linear shelf space for distilled spirits; and
 - c. Capping the number of licenses and issuing RFP's to attract potential agents and using population as the means to apportion stores throughout the state.

Understanding the critical importance of timely analysis, PFM began the project on November 8, 2010, one business day after award of contract, and has been actively engaged in the gathering of information and the performance of analysis. Through analysis of prior reports, the books and records of various Virginia state agencies, research into liquor regulation in other states and interviews with state officials, industry representatives, trade organizations and others, PFM has developed this report. It outlines the issues surrounding these two options, the factors that influence the economic result and the results of



data analysis performed. As part of this analysis, the PFM team examined information relating to current and post privatization consumption volumes and the anticipated regional and statewide changes in volume under each scenario. The team also evaluated the potential to attract customers for liquor and wine from neighboring jurisdictions and considered price elasticity assumptions and the impact of potential price increases on projected sales volumes.

Additionally, the team examined the rationale for minimum bids for retail store licenses and evaluated the projected revenues that could be achieved based on other state experiences and changes in assumptions.

In this final report, PFM reviews its analysis of the reasonableness of the assumptions and how the stated assumptions are supported by data and research. We examine the degree to which the assumptions (and projected revenue streams) are susceptible to variation, based on sales volume, number of stores and other conditions and discuss the risks faced by the Commonwealth based on the alternatives analyzed.

Goals of Liquor Privatization

PFM was provided with three goals to measure our recommendations against in conducting this analysis. They were:

1. To make State government smaller and less costly, and promote private sector economic activity in Virginia;
2. To accomplish privatization in a way that was, at worst, neutral to the State's finances; and
3. To provide additional capital to leverage new investment in the State's transportation infrastructure.

Approach Descriptions

Approach Descriptions

In evaluating the two approaches, the PFM team assumed the VABC would remain the wholesaler of all distilled spirits in Virginia and would continue to control the distribution to retail liquor licensees or agents that serve the consumer and on-premise establishments. In doing so, we assumed that VABC would apply a mark-up to the cost paid to the distillers and collect the current spirit excise tax as part of the wholesale price. At the same time, we assumed that the volume of Virginia wine currently sold at VABC stores would be absorbed into the private retail market.

License Approach

Under this approach, all 334 VABC retail stores would be closed and approximately 1,000 new licenses would be issued for private retail off-premise sales. Preference would be given to current retail wine and beer licensees; licenses would be restricted to:

- One license for every 8,000 population;
- No more than 600 high-volume outlets;
- 150 larger wine and beer retail stores;
- 150 other medium-sized retailers; and
- 100 smaller outlets.

The restrictions on the size of the outlets are defined by retail square footage and linear feet of shelf space as follows:

- Level One: Retail establishments with a minimum of 15,000 net total retail square feet, with a minimum of 200 linear feet of shelving space to the sale of distilled spirits. This definition is intended to cover major retailers such as Costco and Wal-Mart, large format grocery chains, and possibly very large wine and liquor vendors (with retail square footage in excess of the limitations of Level Two).
- Level Two: Retail establishments of less than 30,000 net total retail square feet, with a minimum of 200 linear feet of shelving space to the sale of distilled spirits, and at least 70 percent of gross revenues generated from the sale of alcoholic beverages. This category is intended to capture specialty wine, beer and liquor vendors.
- Level Three: Retail establishments with a maximum of 15,000 net total retail square feet, and a maximum of 200 linear feet of shelving space to the sale of distilled spirits. This category is intended to capture smaller, convenience-type vendors.
- Level Four: Retail establishments with less than 3,000 net total retail square feet, a maximum 200 of linear feet of shelving space to the sale of distilled spirits, and maximum 50 employees statewide. This category is intended to capture the “mom and pop” type retailers.

The rationale for the restricted-issuance License Approach is:

1. To provide sufficient control to assure an orderly transition to a private market;
2. To provide sufficient additional retail outlets (approximately 3 times the number of existing VABC stores) to foster sales growth due to consumer convenience;
3. To promote price competition for Virginia consumers; and
4. To create sufficient scarcity (approximately one sixth the number of off-premise wine and beer licenses) to add value to the license franchise for the purpose of maximizing the up-front payment bids. For optimal up-front payments, the franchises would be issued in perpetuity (subject to continually meeting certain regulatory requirements). While it is possible to limit the time length of the franchise, this will bring timing issues in the calculation of their value (will there be sufficient time to recoup the investment).

Proponents of this approach indicate that it creates a true privatization of the retail marketplace in Virginia. It makes Virginia government smaller by eliminating the bulk of VABC public employees and promotes business entrepreneurship and profit incentive through fair and healthy competition, which are the keys to economic growth. It also generates considerable up-front investment to capitalize the State's need for cash to finance infrastructure investment, represents the best chance of achieving excise tax revenue growth through an increase in Virginia-based sales, and provides the greatest chance for additional tax revenue through employment and profitable commerce.

Agent Approach

Under the Agent Approach, all 334 VABC retail stores would likely be closed and approximately 1,000 new or existing retailers, the majority of which would likely be current licenses for off-premise sales of wine and beer, would be engaged to sell distilled spirits in their stores as agents for the Department. By contract, VABC would determine the type and variety of product to be sold, the prices to be charged, the hours of operation and a variety of other business conditions.

The new licensed agents would be selected by competitive bid, with restrictions similar to the levels created under the License Approach. The bids would be in the form of a commission percentage of retail sales, exclusive of taxes, and the lowest percentages would be chosen. An up-front franchise fee may be required as part of this process.¹

The agents would provide periodic sales reports and deposit receipts, net of commission, into VABC lock-box accounts.

Proponents of the Agent Approach point out that it also makes government smaller by creating similar State workforce reductions but offers the State more control over the sale of liquor. As a result, it would provide more price stability and control and would afford the State a larger profit by retaining the non-commission portion of the retail mark-up. Along with this control, the State would confront fewer regulatory issues than could be expected under the free-market License Approach.

¹ The Commission auction approach differs from that used in other states. States that use agents have a variety of methods for compensating agents for sales. Some use a flat commission, which varies from 6.00 percent in Ohio to 9.65 percent in Washington. Other states apply marginal commission rates that decline as sales reach certain thresholds; for example, Idaho's commission is 12 percent on the first \$325,000 in sales, 8 percent on the next \$75,000 and 4 percent on sales over \$400,000 based on sales in the prior fiscal year. In other states, agents purchase at a discount, which varies between 8 percent and 12 percent. Utah agents receive no monthly commission or discount at purchase; they receive even monthly payments based on average monthly sales of the previous year.

At the same time, continued State involvement will reduce the flexibility afforded by the License approach to allow market forces to dictate choices related to locations, marketing and promotion. It is also likely that the Commission percentage will reduce the interest from some retailers in retail sale of distilled spirits. In the long run, these factors may also limit consumer choice and convenience.

As will be demonstrated in the sections that follow, in different ways, both of these approaches meet the three project goals.

- Both make government smaller by eliminating the public employees that staff the VABC stores and replace them with private sector employees, albeit in one approach they are simply private sector agents.
- Both can be crafted to be neutral to the State's financial plan, if not slightly positive to the State Budget. However, the design of the two approaches yields different financial results. Our analysis indicates the License Approach is likely to generate significant up-front payments via the license auction process, but less ongoing additional revenue as the retail portion of current VABC profit is transferred to the private sector. Conversely, the Agent Approach will not generate any material up-front payments, but will yield higher recurring revenue from ongoing profit.
- Using different financing structures, either source of funds can be leveraged for additional transportation infrastructure investment.

Economics of Privatization

Economics of Privatization

Privatization introduces a variety of important factors and variables into a system that is currently monolithic and controlled. A market-driven retail system will likely provide greater opportunity for consumer-driven service; at the same time, the introduction of a private-sector profit motive will introduce new business models that will change some of the current system's equations related to product pricing, location and the cost of doing business. This, in turn, may impact on demand and sales levels. This section will discuss some of these key issues, with the goal of understanding how they will impact on franchise fees, retail sales and state revenues.

Overview of Beer and Wine Distribution System

Retail privatization of distilled spirits may be informed by Virginia's experience with privatized retail sale of beer and wine. Currently, approximately 6,600 off-premise beer and wine retail licenses exist in the Commonwealth. It is likely that a significant subset of these entities will be interested in adding distilled spirits to their offerings. As a result, it is helpful to understand the beer and wine retail operations to provide context for the privatization of distilled spirits.

At present, the beer and wine off-premise retail licenses are owned by a variety of entities ranging from large, national discount membership club stores to small, sole proprietor stores. Off-premise licensees must maintain a minimum of \$2,000 per month in food sales and a minimum of \$2,000 in inventory; for a licensee that only sells beer, the minimum monthly food sales and inventory amount is \$1,000. In general, the licensees can be organized into the following categories (with the percentage of licenses represented by each):

- **Group A:** National and regional grocery stores and membership club chains – 15%
- **Group B:** National and regional convenience and/or drug store chains, and large beer and wine retail stores – 23%
- **Group C:** Local convenience and/or drug store chains – 22%
- **Group D:** Local sole proprietor and other locally-owned small businesses – 40%

Additionally, there are approximately 1,750 combination wine and beer on and off-premise licenses. Members of this group include American Legion posts, national hotel chains, country clubs, small/medium-sized restaurants and other similar groups.

The 6,100 on-premise beer and wine licenses are comprised of a majority (approximately 4,600) of on-premise mixed beverage restaurant licensees who can sell distilled spirits, beer, and wine). Subject to Virginia statute, a mixed beverage restaurant licensee must have "gross receipts from the sale of food cooked or prepared, and consumed on the premises and nonalcoholic beverages served on the premises, after issuance of such license, amount to at least 45 percent of the gross receipts from the sale of mixed beverages and food."²

Retail entities receive beer and wine via designated for-profit wholesalers at the suppliers' discretion. Suppliers can designate a wholesaler for a specific region or for the entire Commonwealth. The majority of the larger suppliers franchise wholesale functions for specific geographic regions. Currently, suppliers

² Virginia Code 4.1-210.

use approximately 80 beer wholesalers and 250 wine wholesalers to provide their product to retail entities. It is important to note that a subset of the beer and wine wholesalers perform wholesale duties for both beer and wine. Also, the Commonwealth incorporated a non-profit that has approximately 100 of the 250 wine wholesalers operate as agents to provide Virginia produced wine (farm wineries) to retail. This operation accounts for a small percentage of wholesale revenue.

The hospitality and restaurant industry procures beer and wine in a different manner than distilled spirits. Currently, the hospitality and restaurant industry receives beer and wine from wholesalers and may negotiate volume discounts and other arrangements. Conversely, distilled spirits are purchased directly from the Commonwealth VABC store just as an individual would, minus sales tax (which is applied at the time of sale to the end-consumer). No volume discounts, delivery, or any other incentives are allowed for the sales of distilled spirits to the hospitality and restaurant industry.

The method of charging for transportation and delivery costs is not dictated by law in Virginia and varies by wholesaler. Some wholesalers charge a flat transportation fee for the product upon delivery to the retailer, while others include the transportation charge within the per-case price charged to the retailer; neither method is predominant and both are widely used among beer and wine distributors.

With privatization of the retail of distilled spirits, is it likely that many existing beer and wine retailers would have an interest in pursuing licenses to sell distilled spirits. Assuming 1,000 retail distilled spirits licenses would be available, approximately 15 percent of entities now selling beer and wine could obtain a license to sell distilled spirits.

The following is a projected allocation of the retail licenses to sell distilled spirits:

- **600 Level One licenses:** 15,000 sq ft or larger retail space and minimum 200 linear ft. shelf space for distilled spirits (example: big box, grocery store).
- **150 Level Two licenses:** less than 30,000 sq ft retail space, minimum 200 linear ft. shelf space for distilled spirits, and minimum 70 percent gross revenues generated from sale of alcoholic beverages (example: package store, specialty wine and beer shop).
- **150 Level Three licenses:** less than 15,000 sq ft retail space and maximum 200 linear ft. shelf space for distilled spirits (example: convenience store, retail pharmacy).
- **100 Level Four Licenses:** less than 3,000 sq ft retail space, maximum 200 linear ft. shelf space for distilled spirits, and maximum 50 employees statewide.

It is assumed that most of the distilled spirit retail licensees or agents will come from the ranks for the current beer and wine retailers. However, it is important to note that the “mix” of spirits licensees is different from the current pool of beer and wine retailers. The majority of the beer and wine off-premise retail licenses are held by stores approximately equivalent to level three and level four licenses described above (accounting for 62 percent of all off-premise licenses). By contrast, distilled spirit off-premise retail licenses would be primarily held by entities qualifying for Level One licenses. Currently, there are approximately 1,000 beer and wine off-premise retail licenses among stores sized similarly to the proposed level one description. Under a privatization of the retail of distilled spirits, approximately 60 percent of those 1,000 licensees could obtain an off-premise distilled spirits retail license. Similar calculations for each of the four-levels and comparison to the beer and wine licensees approximately yield the following comparative license allocation:

	Beer and Wine		Distilled Spirits		Potential Beer and Wine Licensees That May Obtain Distilled Spirit License
	% of Current Licenses	# of Current Licenses	% Allocated	Licenses Allocated	
Group A	15%	990	60%	600	61%
Group B	23%	1518	15%	150	10%
Group C	22%	1452	15%	150	10%
Group D	40%	2640	10%	100	4%
TOTAL	100%	6,600	100%	1,000	15%

Virginia officials indicate that the design of the spirits license allocation is intended to limit the proliferation of liquor outlets, promote sufficient scarcity to give the license high value and to emphasize larger retailers in an effort to promote price competition. The approach appears plausible and should allow for sufficient market coverage and the ability to yield significant up-front license fees. Additionally, since the majority of the licenses are likely to go to stores already devoting shelf space to beer and wine, new retail stores are not likely to result. Instead, stores currently licensed for off-premise retail sale of beer and wine will likely add shelf space to accommodate distilled spirits.

Price of Liquor

In a wholesale system, the final price of distilled spirits will generally be a combination of several key factors:

- Cost of product, which is often referred to as the 'delivered case cost';
- Transportation and delivery (T & D) charges;
- Wholesale mark-up;
- Retail mark-up; and/or
- Taxes.

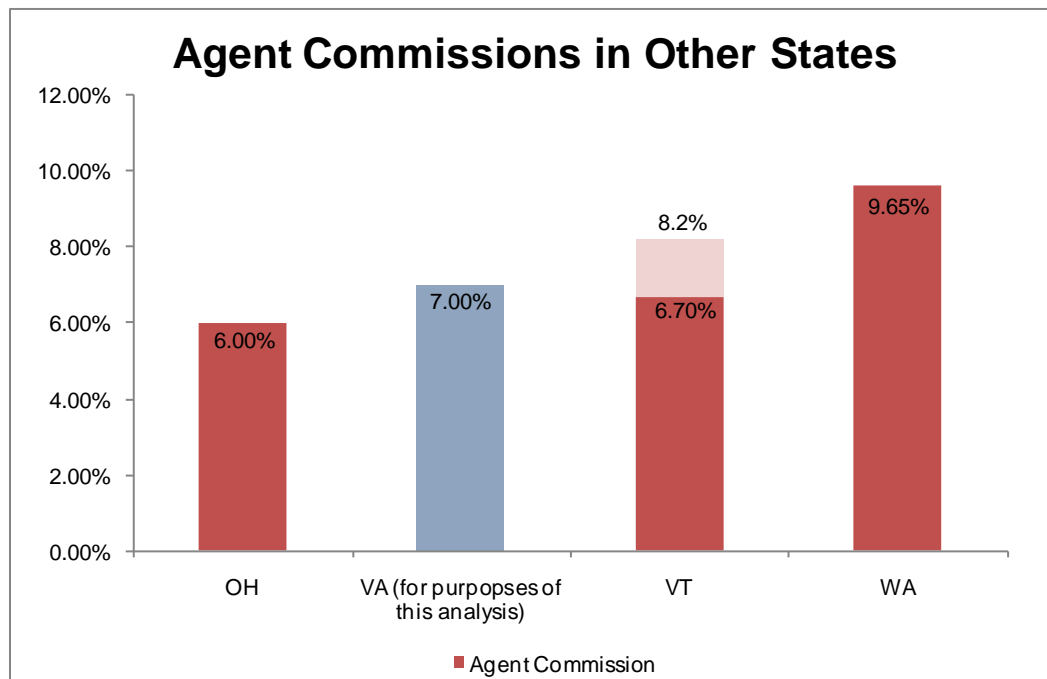
There are other factors that will impact on final price, and these often vary from state to state. Ultimately, the final price will have some impact on the types and volume of sales and tax and other revenue for the State. The key aspects of that discussion follow.

Agent Commissions

For the purposes of this analysis, PFM has assumed that agents will be paid a commission of seven percent of retail sales exclusive of sales tax. This commission approximates the midpoint among commissions used in other states, as shown by the graph below.³

³ Among those states using some instance of flat commission rates, Ohio uses 6 percent, Vermont applies a range between 6.7 to 8.2 percent, and Washington utilizes 9.65 percent for its hybrid stores.

However, the assumed 7 percent commission could be structured in a variety of manners. A certain percentage commission on an initial volume of sales, with a smaller, additional add-on percentage for volume increments above the initial volume, is a workable model used by other states, including Idaho, Montana, Oregon, Vermont, and Washington. This option shares cost risk between the state and agent. Another approach is to apply a flat percentage commission to the total volume of sales as is done in New Hampshire, and Ohio. A third alternative is to sell the goods at discounted percentage. Maine applies a varying discount rate based upon the price of the product sold. In this structure, the cost risk resides mostly with the agent in terms of sale of product, with payment up-front in terms of discounted price.⁴



Wholesale and Retail Mark-Up

Wholesale Mark-Up

In accordance with applicable state statute, mark-ups are allowed and applied to both the wholesale and retail distribution of distilled spirits to allow for adequate coverage of the cost of operation of the State's wholesale liquor business, yield a reasonable profit, and be competitive with distilled liquor prices in neighboring states. This is a challenge for the Commonwealth, as it is not perceived to be particularly price competitive with neighboring states. In an analysis of the 50 states and the District of Columbia of the federal, state and local tax burdens on a typical bottle of spirits in 2009, the Distilled Spirits Council estimated the Virginia retail price the highest (\$16.70) of adjacent states and the District of Columbia. The other states, in descending order of price, were North Carolina (\$14.93), Tennessee (\$14.12), District of Columbia (\$13.11), West Virginia (\$12.75), Maryland (\$12.01) and Kentucky (\$11.64).⁵

⁴ In Maine, if the price of product is under \$15.00, a 9 percent commission in the form of a discount at time of purchase from wholesale is applied; if the price of product is \$15.01 to \$24.99, a 10 percent commission in the form of a discount at time of purchase from wholesale is applied; and if the price of product is \$25.00 or greater, a 12 percent commission in the form of a discount at time of purchase from wholesale is applied.

⁵ Distilled Spirits Council, 2010.

At present, VABC is both the wholesaler and the retailer and does not separate the mark-ups into two pieces. Instead, they impose a mark-up of approximately 70 percent over the distiller's price, including delivery and Federal Excise Tax. To isolate the retail operation for privatization under the License Approach, it is necessary to break the mark-up into a wholesale component to be retained by the state and a retail component to be collected by the private retailer.

PFM's analytical approach is to identify an appropriate wholesale mark-up as the key variable in achieving Budget Neutrality.⁶ For the purpose of this analysis, we assume that the costs related to the transportation and distribution of distilled spirits are included in the wholesale markup. The additional cost associated with transportation and distribution is discussed and accounted for in the Cost of Conversion section of this report.

PFM's analysis assumes the Commonwealth maintains control of its wholesale operations, which allows the State to preserve and control revenue generated through excise taxes and wholesale mark-ups.

Under the current system, retail prices are determined using the following formula:

Supplier Cost
<i>Plus:</i> Federal Excise Tax
<i>Plus:</i> Handling Charge
= Total VABC Cost of Goods
<i>Plus:</i> State Mark-Up
<i>Plus:</i> State Excise Tax
<i>Plus:</i> T&D
<i>Plus:</i> Sales tax (for consumer sales)
Total Retail Price

Under the Agent Approach, this pricing system will remain essentially unchanged, with an agent's commission deducted from the gross sales. However, under the License Approach, a separate wholesale and retail mark-up scheme will be required. Under that approach, the pro forma for the cost of goods will be:

Supplier Cost
<i>Plus:</i> Federal Excise Tax
<i>Plus:</i> Handling Charge
= Total VABC Cost of Goods
<i>Plus:</i> State Mark-Up
<i>Plus:</i> State Excise Tax
<i>Plus:</i> T&D
Total Wholesale Price
<i>Plus:</i> Retail Mark-up
<i>Plus:</i> Sales Tax (for consumer sales)
Total Retail Price

⁶ For this report, Budget Neutrality is defined as achieving a similar relationship between ongoing revenue and expenditures from the privatization of the retail sale of distilled spirits as currently exists with the State operating the retail stores. This compares ongoing revenues and expenditures and does not include one-time revenues (such as from the auction of franchises) or one-time expenditures (such as the cost of closing state stores).

Under the new model of privatization, the Commonwealth will be giving up some portion of the value derived from its mark-up of 69 percent. The analysis attempts to recapture this value through both a wholesale mark-up and the sale of retail licenses. The trade-off in this calculation is to retain a sufficient level of mark-up to support Commonwealth operations while leaving enough retail mark-up available to licensees to incent business investment and minimize the effect on the final shelf price to consumers. In an effort to achieve a mark-up level that will allow the Commonwealth to continue to maintain Budget Neutrality, we have assumed a wholesale mark-up of 50 percent under the new model. Using fiscal year 2010 as the benchmark year, the per-gallon wholesale price is calculated as follows:

Estimated Current Average Cost per Gallon	
Total Cost of Goods	\$34.78
Handling and Rounding	\$0.55
VA ABC Mark-Up @ 69%	\$24.00
State Excise Tax @ 20%	\$11.86
Total Price of Goods	\$71.19
Retail Sales Tax @ 5%	\$3.56
Total Cost to Customer	\$74.75

Projected Average per Cost Gallon	
Total Cost of Goods	\$34.78
Handling and Rounding	\$0.00
Wholesale Mark-Up @ 50%	\$17.39
Wholesale Price	\$52.17
State Excise Tax @ 20%	\$10.43
Total Wholesale Price of Goods	\$62.60
Retail Mark-Up @ 15.10%	\$7.88
Total Retail Price per Gallon	\$70.48
Retail Sales Tax @ 5%	\$3.52
Total Cost to Customer	\$74.01

*Mark-up is on the product price, not the Excise Tax

Handling and Rounding	
Handling	
Handling Per Case	\$1.00
Gallons Per Case	2.377548
Handling Per Gallon	\$0.42
Rounding	
Max Rounding per bottle	\$0.0499
Average bottles/Case	12
Max Rounding per case	\$0.5988
Gallons Per Case	2.377548
Max Rounding/Gallon	\$0.2519
Max. Excise Tax Rounding/Case	0.5988
Total Max Rounding/Gallon	\$0.2519
Mid-Point of Rounding/Gallon	\$0.1259
Handling Plus Rounding/Gallon (Handling + Mid-Point Rounding)	\$0.55

Retail Mark-Up

While the amount of the wholesale mark-up was driven by the exigencies of Budget Neutrality, the PFM Team has derived the retail mark-up to be the margin available within the current retail price of \$74.75 per gallon. Accordingly, as shown above, the average retail mark-up would need to be 15.10 percent.



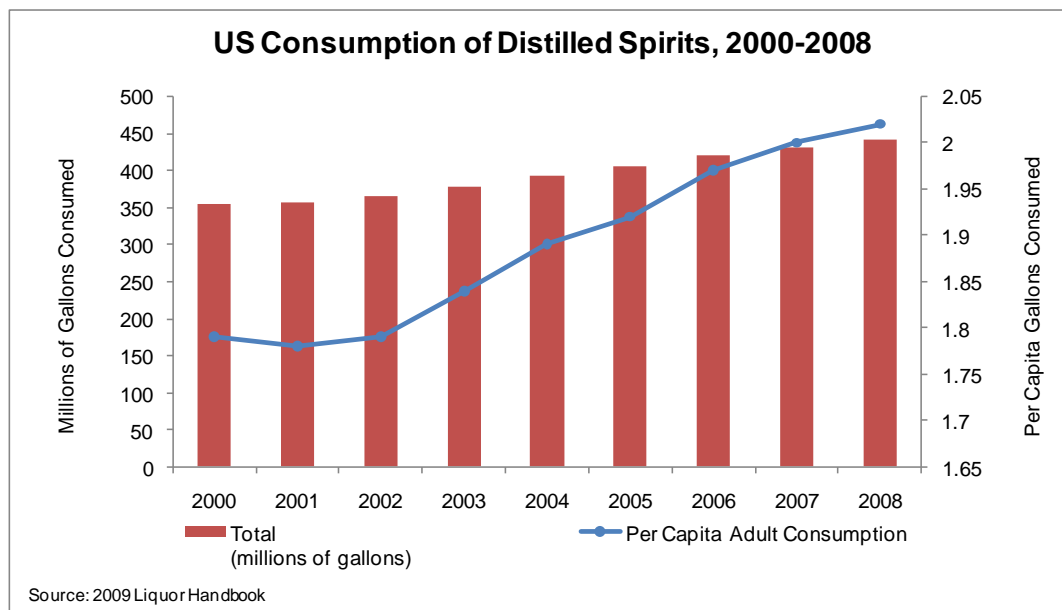
For purpose of discussion, the following identifies the impact on price of other retail mark-up levels – 5 percent, 10 percent, 15.1 percent (as given here) and 20 percent. These will have varying impacts, particularly as they relate to consumption.

Mark-up Levels	5.0%	10.0%	15.1%	20.0%
Wholesale Price	\$ 52.17	\$ 52.17	\$ 52.17	\$ 52.17
Total Wholesale Price of Goods	\$ 62.60	\$ 62.60	\$ 62.60	\$ 62.60
Retail Mark-up	\$ 2.61	\$ 5.22	\$ 7.88	\$ 10.43
Total Retail Price per Gallon	\$ 65.21	\$ 67.82	\$ 70.48	\$ 73.03
Retail Sales Tax @ 5%	\$ 3.26	\$ 3.39	\$ 3.52	\$ 3.65
TOTAL Cost to Customer	\$ 68.47	\$ 71.21	\$ 74.01	\$ 76.69

Consumption and Sales

There are two related issues that will directly impact revenue levels for the Commonwealth: how changes in price and convenience might impact consumption of distilled spirits and the purchase of distilled spirits. These are complex topics that do not lend themselves to simple rules-of-thumb analysis. In our analysis and review, it is likely that changes in the model for delivering service in the Commonwealth will lead to differing changes in levels of consumption and sales in communities and regions within the Commonwealth.

Nationally, consumption of distilled spirits has been steady or increasing, both in total gallons and per capita, since the year 2000. Over that period, yearly growth has averaged 3.1 percent. The trend has been somewhat flatter for per capita adult consumption, but it has also been trending upward.⁷ Over that period, yearly growth has averaged 1.6 percent. The following chart details these trends:



Growth has moderated of late, likely due in part to the national economic downturn. According to the National Bureau of Economic Research, the nation entered into a recession in December 2007, and that recession ended in June 2009.⁸ Current forecasts are that growth in distilled spirits will be approximately 1.7 percent over the next five years on an annual compound growth rate.⁹

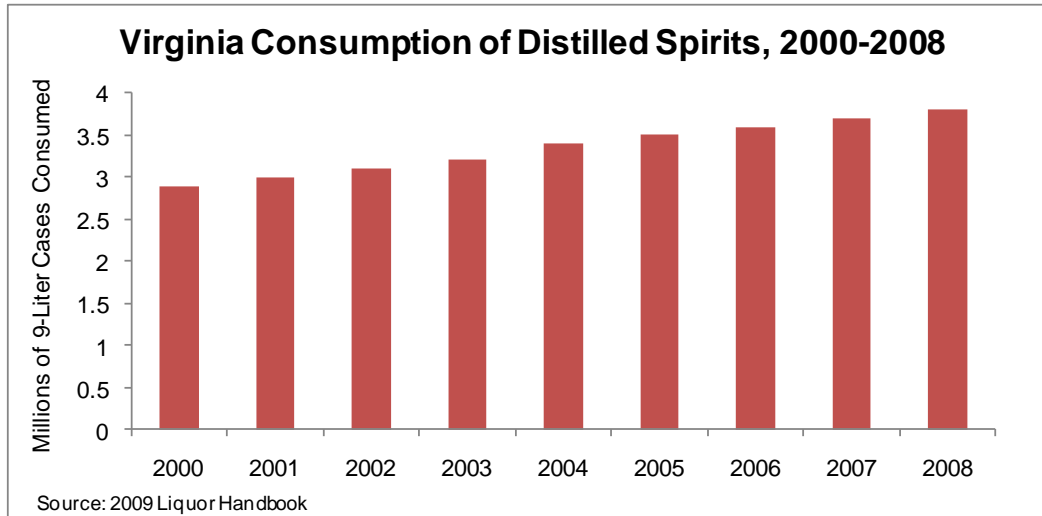
The Commonwealth of Virginia has also experienced growth in consumption during this timeframe, with consumption of total distilled spirits (9-liter cases) growing from 2.91 million cases in 2000 to 3.82 million in 2008.¹⁰ This represents average growth of 3.8 percent. The following chart details this trend:

⁷ The Beverage Information Group, "Liquor Handbook 2009," p. 13.

⁸ National Bureau of Economic Analysis, accessed electronically on November 29, 2010 at <http://www.nber.org/cycles/cyclesmain.html>

⁹ The Beverage Information Group, "Liquor Handbook 2009," p. 7.

¹⁰ Ibid., p. 26-27.



While the Commonwealth's growth rates have generally kept pace with other control states in recent years, it is still well below average in per capita consumption.¹¹ For 2009, Virginia's per capita consumption of distilled spirits for those 21 years of age and older was 1.62 gallons, which ranked 45th among the 50 states and the District of Columbia. The only states with lower per adult consumption of distilled spirits were Oklahoma, Ohio, Alabama, North Carolina, Utah and West Virginia.¹² The following discussion outlines some of the factors that may be impacting on levels of sales and/or consumption in Virginia.

Consumption: The Relationship of Price and Demand

For most products, a basic market tenet holds that there is a relationship between its price and the quantity that will be demanded. This relationship varies, depending on the perceived necessity of the product or service. The measure of responsiveness of quantities demanded with changes in price is known as the price elasticity of demand. In general, price elasticity of demand is a negative number, and is expressed as the percentage change in quantity demanded in response to a one percent change in price. In general, elasticities of demand of less than -1.0 are considered relatively inelastic (changes in demand are less responsive to changes in price), while elasticities of demand of greater than -1.0 are considered relatively elastic (changes in demand are more responsive to changes in price).

There has been extensive research and study done related to the price elasticity of demand for alcoholic beverages. In some cases, this research has been conducted by surveys or other methods to make direct price comparison, but many use tax rates and/or state mark-up as surrogates, as changes in prices across a region are largely the result of differences in tax rates or other state-imposed costs.¹³

Price elasticities of demand for alcohol have varied from relatively inelastic to relatively elastic.¹⁴ Studies that differentiate by type of product have also found differing elasticities for beer, wine and distilled spirits, with generally (but not always) lower elasticities of demand for beer and wine than for distilled spirits.¹⁵

¹¹ Ibid. p. 30. Virginia's percent change of total distilled spirits consumption in 2004-2008 were 4.1, 3.4, 3.7, 3.4 and 2.0 percent respectively. U.S. states average growth rates for those years were 4.1, 2.8, 3.7, 2.8 and 2.1 percent respectively.

¹² It is notable that of the bottom ten states in adult consumption, seven are alcoholic beverage control states (Alabama, North Carolina, Ohio, Pennsylvania, Utah, Virginia and West Virginia) and three are license states (Arkansas, Tennessee and Texas).

¹³ A recent survey of the available surveys was done by Alexander Wagenaar, Matthew Salois and Kelli Komro, "Effects of beverage alcohol price and tax levels on drinking: a meta-analysis of 1003 estimates from 112 studies," *Addiction*, 2008, p. 179.

¹⁴ A meta-analysis of studies from 18 countries, including 46 beer own-price elasticity estimates, 54 wine own price elasticity estimates and 50 spirits own price elasticity estimates ranged from 'highly inelastic (-0.09) to elastic (-1.20) with a mean of -0.38.' James Fogarty, "The Nature of the Demand for Alcohol: Understanding Elasticity," *British Food Journal*, 2006, p. 320.

Because this has been an extensive topic for study, additional research has included several 'studies of the studies.' These have examined differences in scope, methodology and analysis that can materially impact on the results. One method for seeking to create order from widely varying study results is to conduct a meta-analysis. A meta-analysis uses statistical methods to assess the results of studies that address a particular research topic. In the case of alcohol price elasticities of demand, three meta-analyses have been conducted.¹⁶ The most recent of these reported mean elasticities of -0.46 for beer, -0.69 for wine, and -0.80 for distilled spirits.¹⁷ This analysis, which discussed potential areas of concern with the previous two studies,¹⁸ has, of late, become something of a consensus for discussion of elasticities of demand.

As a consequence we use this -0.80 elasticity of demand as a starting point where it warrants discussion. At the same time, we note that this may be impacted by other factors in the analysis.¹⁹ One possibly significant factor is the relationship between price and demand in control versus license states. One study of the differences in these systems determined that the demand for distilled spirits and beer were significantly more sensitive to price changes in license states than in control states.²⁰

Convenience as a Driver of Consumption and Sales

It is generally believed that greater access to distilled spirits will increase sales within the Commonwealth. The primary factors cited in support of this are:

- Current levels of consumption of distilled spirits in Virginia are significantly lower than would be expected given household income levels.
- The Commonwealth's experience with increased access, both Sunday sales and additional stores, which have increased levels of sales.
- In other states, an increase in access has led to an increase in sales.
- Wine is often purchased in tandem with distilled spirits, and greater convenience for distilled spirits will also increase purchase of wine in the Commonwealth.

Consumption and Household Income

It is generally accepted that there is a correlation between levels of income and expenditures on alcohol, with higher income cohorts having higher levels of expenditure per capita. This correlation has been

¹⁵ One frequently cited source, S.F. Leung and C.E. Phelps determined price elasticities of demand to be -0.3 for beer, -1.0 for wine, and -1.5 for distilled spirits. "My Kingdom for a drink...? A review of estimates of the price sensitivity of demand for alcoholic beverages", in M.E. Hilton and G. Bloss "Economics and the Prevention of Alcohol-related Problems: Proceedings of a Workshop on Economic and Socioeconomic Issues in the Prevention of Alcohol Related Problems", National Institute on Alcohol Abuse and Alcoholism, 1993, p. 1-31.

¹⁶ The first two studies were by Fogarty, previously cited, and C.A. Gallet, "The Demand for Alcohol: A Meta-Analysis of Elasticities," *Australian Journal of Agricultural Resource Economics*, 2007, (51):p. 121-135.

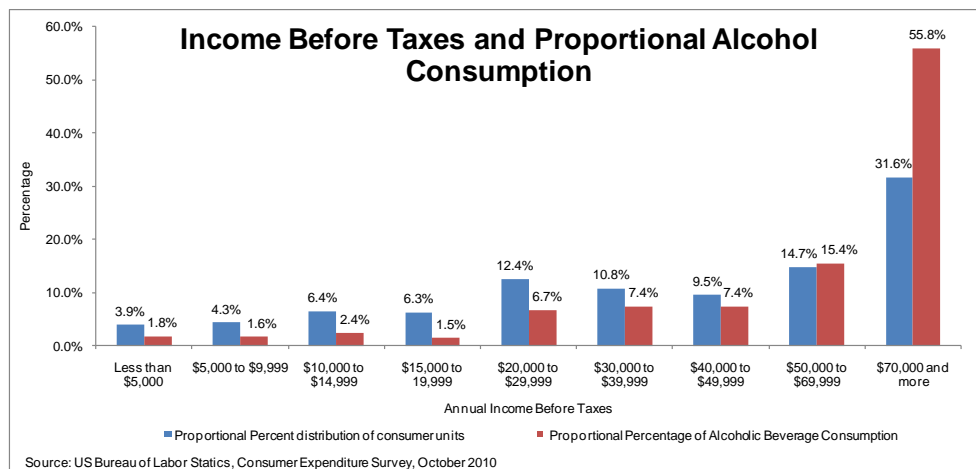
¹⁷ Wagenaar, Salois and Komro, p. 187.

¹⁸ The study noted that Fogarty's review only included studies to 1992; it also noted that both studies aggregated the results and did not provide additional weighting for primary studies.

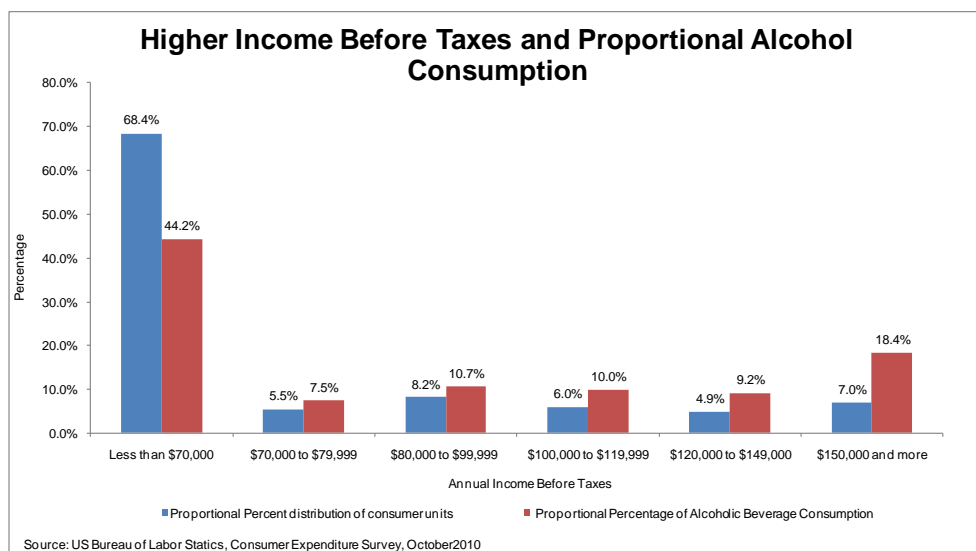
¹⁹ For example, the concept of *ceteris parabis* – holding other things constant – must be kept in mind. In the case of changes in demand based on changes in price, VABC has suggested that there was little impact on demand on the occasions when they initiated price increases. However, these price increases were generally small and infrequent. For example, the mark-up was not changed between August 1, 2004 and February 1, 2008 – a period of three years and six months. The increase at that time was 4.0 percent. By contrast, the Consumer Price Index in that same timeframe had increased by 11.7 percent. In these cases, it is likely that positive changes in levels of household income for Virginia consumers were larger than the price changes.

²⁰ Bjorn Trolldal and William Ponicki, "Alcohol Price Elasticities in Control and License States in the United States, 1982-99," *Addiction* (100), 2005, p. 1158-1165.

found both in academic studies²¹ and in data from the U.S. Bureau of Labor Statistics (BLS) Consumer Expenditure Survey. The following chart, from the October 2010 BLS survey, indicates that higher income consumers spend significantly more on alcohol than lower income cohorts:²²



This continuum continues at higher income levels as well.²³



²¹ For example, one multiple-model study found that the preferred model showed that income had a significant effect on alcohol expenditures, with a one percent increase in household income increasing the probability of consumption by 0.21 percent, the conditional level of expenditures by 0.13 percent, and the unconditional level of expenditures by 0.34 percent; the study concluded that “the effects of income on alcohol expenditures are small but positive.” Steven T. Yen and Helen H. Jensen, “Determinants of Household Expenditures on Alcohol,” Working Paper 95-WP 144, Center for Agricultural and Rural Development, Iowa State University, December 1995, p. 9. A recent study supported by a grant from the National Institute of Health, one of the first to examine the relationship between lifetime income trajectories and alcohol consumption, reported that across each of the three age cohorts they studied, level of income was the most important predictor of alcohol use. Magdalena Cerda, Vicki Johnson-Lawrence and Sandro Galea, New York Academy of Medicine, “Income and Alcohol Consumption: Investigating the Links Between Lifecourse Income Trajectories and Adult Drinking Patterns,” Paper presented at the Population Association of America 2010 Annual Meeting, April 15-17, 2010. Downloaded electronically on 11/14/2010 at <http://paa2010.princeton.edu/download.aspx?submissionId=101517>

²² United States Department of Labor, Bureau of Labor Statistics, “Consumer Expenditure Survey,” October 2010, accessed electronically on 11/21/2010 at <http://www.bls.gov/cex/>

²³ Ibid.

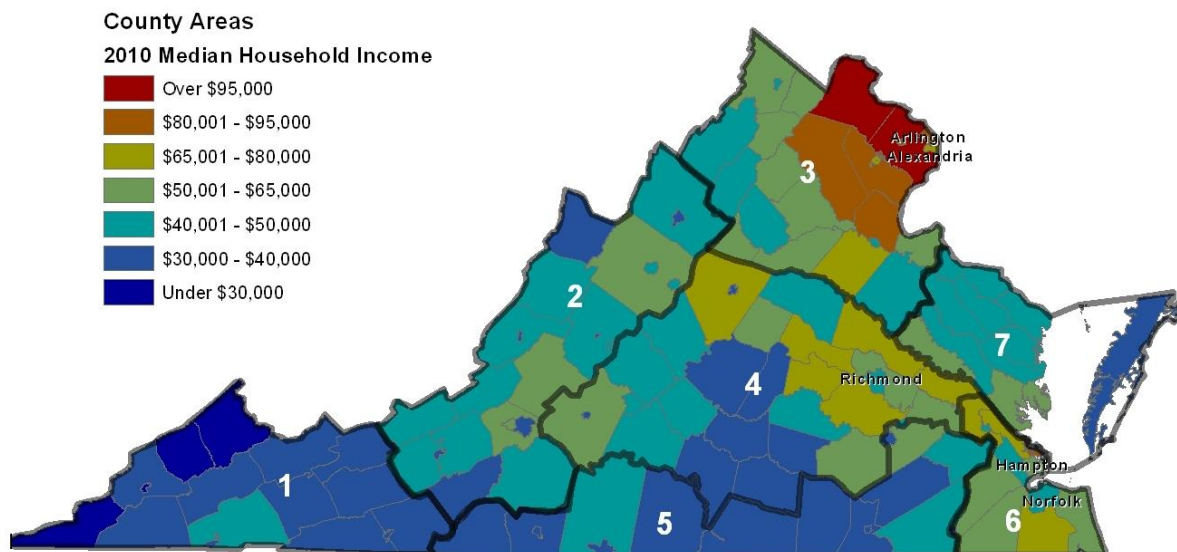
The BLS data combines beer, wine and distilled spirits; analysis of consumption and spending for distilled spirits alone yields a similar relationship. The following table identifies the percentage of persons who drink distilled spirits by income group.²⁴

\$75,000 & over	\$60,000 - \$74,999	\$50,000 - \$59,999	\$40,000 - \$49,999	\$30,000 - \$39,999	Under \$30,000
52.8%	47.7%	39.9%	44.1%	39.0%	35.5%

There is an even stronger correlation with the income distribution of the total consumption of distilled spirits.²⁵

\$75,000 & over	\$60,000 - \$74,999	\$50,000 - \$59,999	\$40,000 - \$49,999	\$30,000 - \$39,999	Under \$30,000
47.8%	10.9%	7.3%	8.2%	8.2%	17.6%

On average, the Commonwealth of Virginia is a high income state. According to the U.S. Census Bureau, Virginia's combined average Median Household Income for 2008-2009 was, at \$61,126, the sixth highest of the states. The average for all states was \$49,945, meaning that Virginia's household income was 22.4 percent higher than the national average. There is considerable variation among regions within Virginia. The following map details median household income by county and independent city.²⁶



The concentration of high median household income in the area bordering Washington DC and the state of Maryland in Arlington, Fairfax and Loudoun Counties and the city of Alexandria is notable. This, and

²⁴ Total household income, responses based on total households and include consumers aged 21 and over only. The Beverage Information Group, "Liquor Handbook 2009", p. 296.

²⁵ Ibid., p. 298.

²⁶ Generated by VABC using US Census Bureau data.

the tier of adjacent counties to the south, is the area of Northern Virginia with significantly higher median household income than the rest of the Commonwealth.

While a higher-income state, Virginia's level of alcohol consumption by adults is below average. According to industry data, Virginia 2009 consumption of total distilled spirits (based on 750 liter bottles per 100 adults, aged 21 and older) was 828. By comparison, the U.S. average was 1,026, meaning that Virginia was 80.7 percent of the national average.²⁷ In another common measure, per capita consumption of total distilled beverages by state, Virginia ranks 42nd, at 685 9-liter cases per 1,000 adults (ages 21 and over).²⁸ In this comparison, the national average is 850.8, meaning that Virginia consumption was 80.5 percent of the national average.

Another commonly noted correlation is between consumption of distilled spirits and educational attainment. As noted in the following table, individuals who have at least attended college make up a significantly higher percentage of persons who drink distilled spirits than those that did not:

Graduate Degree	Attended Graduate School	Graduated College	Attended College	Graduated High School	Attended High School
50.1%	50.3%	52.0%	50.9%	39.9%	34.2%

As with income levels, the correlation is also strong when considering the educational level distribution of distilled beverage consumption:

Graduate Degree	Attended Graduate School	Graduated College	Attended College	Graduated High School	Attended High School
10.6%	3.8%	17.4%	30.0%	28.5%	9.7%

The Commonwealth of Virginia generally ranks in the top 20 percent of states on various educational attainment measures, such as percent of population 25 or over with a professional or graduate degree or with a college or professional degree.²⁹

Given its high levels of income and high levels of educational attainment, other factors would appear to be influencing Virginia's levels of consumption.

Recent Virginia Experience with Increased Access

One theory for addressing the disparity between Virginia's levels of household income, educational attainment and consumption is that a significant portion of state resident consumption is reflected in off-sale purchases at out-of-state retail stores. Those who support this theory point to the Commonwealth's experience with increased access.

A notable recent example has been the ability to offer Sunday sales of distilled spirits at some VABC stores.³⁰ Selected VABC stores in eligible cities began Sunday sales in July, 2004. According to a VABC report on the initiative in 2007, since the initiation of Sunday access, sales grew an average of 20 percent

²⁷ The Beverage Information Group, "Liquor Handbook 2010," p. 13.

²⁸ Ibid., p. 21. For ranking purposes, the Beverage Information Group includes the District of Columbia as a state.

²⁹ According to US Census Bureau 2000 data, Virginia was sixth among all states and the District of Columbia in the percent of population 25 and over with a professional or graduate degree (11.12 percent) and tenth among all states and District of Columbia in the percent of population 25 and over with a college or professional degree (35.10 percent). US Census Bureau data analyzed by the Social Science Data Analysis Network and accessed electronically on November 29, 2010 at <http://www.censusscope.org/us/>

³⁰ In 2004, the General Assembly enacted legislation that permitted the sale of distilled spirits on Sunday in certain VABC stores, effective July 1, 2004. The legislation allowed sales in counties in Northern Virginia, Virginia Beach and Norfolk.

per year. The VABC analysis determined that the original Sunday sales locations generated a rate of return on Sundays of 45 percent and a profit and taxes of \$4.3 million. This analysis also determined that “large portions of these sales are new business.”³¹

Based on the initial experience, VABC extended Sunday sales to include approximately an additional 50 stores beginning September 2, 2007. There are currently 131 VABC stores that are open on Sundays.³²

In addition to increasing hours of access through Sunday sales, VABC has, in recent years, also added additional store locations. While this has not had as large an impact on overall system access, it still affords an opportunity to review levels of sales within regions with additional stores.

In July 2005, there were a total of 302 VABC stores in Virginia; as of the end of FY2010, that number had grown to 334, an increase of 32 stores (10.6 percent growth). The following table outlines this growth over time:

Fiscal Year	Number of Stores	Change
2005	302	
2006	312	+10
2007	327	+15
2008	331	+4
2009	332	+1
2010	334	+2

Of the new stores, the majority of them have been located in Northern Virginia, and it is helpful to analyze overall performance there (in terms of additional sales from new locations) versus general growth in sales statewide. Since the start of FY2005, there have been 20 stores added in Northern Virginia. Given that there are currently 78 stores in that region, the additions reflect location growth of 25.6 percent. The following table details store locations, number of stores per city/county and change in number of stores:

City/County	# Stores prior to FY2005	# of Current Stores	Change in # of Stores
Prince William County	7	11	4
Loudoun County	9	12	3
Fairfax County	29	39	10
Arlington County	4	7	3
Alexandria City	5	5	0

³¹ “Additional Stores in Eligible Areas to be Open on Sundays,” *Licensee Newsletter*, Virginia Department of Alcoholic Beverage Control, Fall 2007, vol. 14, no. 1, p. 6. In determining the portion of Sunday sales that were new versus transfer business from surrounding stores and other sales days, VABC compared actual to expected sales growth. Non-Sunday stores and other sales days of the week with less than expected growth were considered negatively impacted by Sunday sales. For the surrounding store analysis, a random sample of non-Sunday operating stores in the vicinity of Sunday stores using an expected growth rate to assess the impact of substitution. Based on the analysis of Sunday sales data, it was estimated that an average of 10 percent of sales was transfer business from non-Sunday stores. For analysis of impact on sales on other business days, analysis was primarily made of Saturday and Monday sales. It was determined that Monday sales evidenced less than normal growth, but Saturday sales were not impacted. In fact, Saturday sales increased over the prior fiscal year – although this was not attributed to Sunday sales. Analysis suggested that approximately 0.1 percent of Monday sales were lost to Sunday sales. Given the level of Sunday sales, VABC determined that 90 percent of the Sunday sales were new sales. See “Sunday Sales Evaluation, Fiscal Year 2005,” Department of Alcoholic Beverage Control, p. 5-6.

³² Sunday store hours are 1 to 6 p.m. Current stores open on Sunday are located in Alexandria (10 stores), Annandale (2), Arlington (6), Ashburn (2), Bristow, Burke (2), Centreville, Chantilly, Clifton, Crystal City, Dale City, Dumfries, Fairfax (6), Falls Church (5), Gainesville (2), Haymarket, Herndon (5), Leesburg, Lorton (2), Loudoun (2), Manassas (4), McLean, Mount Vernon, Oakton, Purcellville, Reston (2), Springfield (2), Sterling (4), Vienna (2), Woodbridge (3), Richmond (10), Chesapeake (8), Hampton (7), Newport News (6), Portsmouth (5), Norfolk (6), Virginia Beach (13).

Manassas City	2	2	0
Falls Church City	2	2	0
Total	58	78	20

While any regional analysis will involve cross-region leakage, Northern Virginia's large population base and high level of household income make it worthy of analysis. The following compares Northern Virginia with other regions in Virginia for gross sales of new and existing stores, in terms of dollar amounts and percentage change in growth:

Region	FY2005	FY2006	FY2007	FY2008	FY2009	FY2010
NOVA Total	\$ 146,354,759	\$ 157,575,422	\$ 167,746,243	\$ 178,101,516	\$ 185,172,688	\$ 190,851,011
NOVA New	\$ 2,017,386	\$ 7,121,316	\$ 17,266,372	\$ 25,896,886	\$ 32,395,929	\$ 35,264,624
NOVA Existing	144,337,374	150,454,106	150,479,871	152,204,629	152,776,759	155,586,388
Other Regions	386,337,742	414,361,436	439,552,482	463,087,552	480,306,791	484,588,014

Growth Rate

Region	FY2006	FY2007	FY2008	FY2009	FY2010
NOVA Total	7.7%	6.5%	6.2%	4.0%	3.1%
NOVA New	253.0%	142.5%	50.0%	25.1%	8.9%
NOVA Existing	4.2%	0.0%	1.1%	0.4%	1.8%
Other Regions	7.3%	6.1%	5.4%	3.7%	0.9%

In comparison to other regions, Northern Virginia experienced larger percentage increases with additional stores. While there clearly was significant substitution effect for the new from the old stores, there generally still was some growth in existing stores as well, suggesting that the additional convenience was overall increasing sales volume.

Other State Experience with Increased Access

There is practical experience in other states with privatization of the retail function in sales of alcoholic beverages. In March, 1987, the State of Iowa became the first state since the end of prohibition to privatize the retail portion of its State distilled spirits monopoly.³³ The legislation that privatized its retail liquor operation required that in the event that a private liquor retailer opened a store within 15 miles of a state store, the state store must be closed. On the effective date of the legislation, there were 195 private retailer licenses that had been granted, and this required the State to close a similar number of its stores. Following privatization, the number of liquor retail outlets increased from the 221 state liquor stores to over 400 private liquor retailers. Besides the increases in physical numbers, the hours of operation also increased, with private licensees able to sell distilled spirits 20 hours a day, including Sundays and holidays. The overall selection of products also increased, from around 900 items to approximately 1,200.³⁴

A review of Iowa's experience 10 years after privatization reached the following conclusions:

- Price increases were gradual and totaled 7.4 percent above what they would have been if the State had retained its stores. Private retailers initially resisted major price increases that may have created a backlash against privatization.³⁵

³³ It should be noted that Iowa had allowed the private sale of wine and beer with over 4 percent alcohol content beginning in July 1985; the state also sold wine in its state stores until July 1986, at which time it ended its wholesale monopoly on wine. Beer under 4 percent alcohol content for both on and off-sale had been handled by licensed private wholesalers since the end of prohibition. See Harold D. Holder and Alexander C. Wagenaar, "Effects of the Elimination of a State Monopoly on Distilled Spirits' Retail Sales: A Time-Series Analysis of Iowa," *British Journal of Addiction*, 1990, p. 1615-1625.

³⁴ "Privatization of Retail Liquor Sales in Iowa," State of Iowa Alcoholic Beverages Division, July 16, 1999, unnumbered pages 1-2. Accessed electronically on 11/8/10 at http://iowaabd.com/files/client_files/191/1912/privatization_of_retail.pdf.

³⁵ *Ibid.*, unnumbered pages 2-3. According to the analysis, the State marked up its product by 76 percent. After privatization, this was reduced to 50 percent; with compounding, this meant that if private retailers sought to maintain current shelf prices, their mark-

- Privatization was deemed successful from a revenue standpoint, with profits increasing by \$125 million over the first 11 years of privatization compared to estimates under State control of the stores.³⁶ At the time of the 10 - year review, the conclusion was that most of the increase in profits was the result of eliminating the state stores and the costs associated with them.

An academic study reached a differing consumption conclusion (at least in the period it reviewed). It determined that consumption within the State increased significantly after privatization of its retail operation. Using a time-series analysis (January 1968 to March 1980, a total of 230 monthly pre-change and 25 post-change observations) that took into account stocking of initial inventory, seasonal sales patterns, substitution effects and cross-border effects, the authors determined that there was a “significant 9.5 percent increase in apparent consumption of distilled spirits in Iowa,” which began in March 1987.³⁷

However, a follow-on academic study reached a different conclusion. Based on later consumption statistics for the state, it determined that time series analyses of monthly sales trends showed that the increased availability had no lasting impact on consumption. The study’s authors concluded that “the findings of this study offer compelling evidence that increasing the availability of alcohol does not necessarily increase its consumption.”³⁸

In terms of analysis of applicability to Virginia, it is notable that Iowa’s two largest population centers, the Des Moines and Cedar Rapids metropolitan statistical areas, are insulated from border sales effects, with both over an hour’s drive from the nearest state. As a consequence, it is unlikely to have the same issue of repatriation of sales that could be experienced in Northern Virginia.

West Virginia has been the most recent state to privatize its distilled spirits retail operation. It is notable that studies have been mixed on its impact on sales, consumption and revenue.³⁹ It is possible that this relates to characteristics of the state that may not be applicable to Virginia. While both Iowa and West Virginia are less populous, Iowa’s population is larger, as is its median household income. It is also conceivable that, as the first state to privatize its retail operation since the end of Prohibition, Iowa’s experience was under more scrutiny and study than West Virginia’s later privatization.

Convenience and Coincidental Purchase of Distilled Spirits and Wine

According to industry sources, privatization of the retail operation for distilled spirits will also lead to repatriation of wine sales. To reach this conclusion, the industry notes that 70 percent of spirits drinkers

up would have to be about 17.3 percent. The analysis determined that, on average, the retail mark-up increased to 20 percent in 1988, 23.4 percent in 1989, 24.0 percent in 1990 and 24.7 percent in 1991. It also concluded that mark-up had, at the time of writing, leveled to 25 percent.

³⁶ Ibid., unnumbered page 3 and attachments A and B.

³⁷ Harold D. Holder and Alexander C. Wagenaar, “Effects of the Elimination of a State Monopoly on Distilled Spirits’ Retail Sales: A Time-Series Analysis of Iowa,” *British Journal of Addiction*, 1990, p. 1620.

³⁸ Mulford, H.A., Ledolter, J. and Fitzgerald, J.L. (1992) Alcohol Availability and Consumption: Iowa Sales Data Revisited. *Journal of Studies on Alcohol*. 53(9) 487-494.

³⁹ As an example, one study, which looked at the experience in both Iowa and West Virginia, concluded that there was a net increase in absolute alcohol consumed in both states across all beverages (beer, wine and distilled spirits) associated with privatization. Alexander C. Wagenaar, Harold D. Holder, “A Change from Public to Private Sale of Wine – Results from Natural Experiments in Iowa and West Virginia,” *Journal of Studies on Alcohol and Drugs*, Vol. 52, 1991, Issue 2: March 1991. By contrast, testimony by Geoffrey F. Segal, Director of Government Reform Policy for the Reason Foundation before the Pennsylvania General Assembly on April 18, 2007 indicated that there are no dramatic differences between control states and license states. Equally, there have been no dramatic shifts in consumption, underage drinking, drinking and driving and alcoholism attributable to privatization in Iowa, West Virginia and Alberta. The testimony also noted that “Implementation of Iowa, West Virginia and Alberta deregulation followed a trending period of moderate increases in per capita alcohol consumption. As a result it is difficult to attribute causation to a trend that continued after the implementation of privatization.”

also drink wine, 50 percent of consumers who make larger purchases make dual purchases, and DC liquor stores sell as many as three cases of wine for every case of spirits.⁴⁰

While this logic chain is plausible, there are other factors that may call into question the magnitude of the presumed repatriation. At the start, it is notable that Virginia consumers already have access to a large number of Virginia outlets for purchase of wine; while distilled spirits can only be purchased for off-premise consumption at the 334 state stores, wine can be purchased for off-premise consumption at approximately 6,600 stores. While it may well be the case that individuals will choose to make coincident purchases of wine and spirits, it is likely that a significant portion of the wine sales are already being made within the Commonwealth. This assumption is supported by a comparison of the per capita consumption rankings for wine and spirits. While Virginia ranks low on average for consumption of distilled spirits, it is already above the national average for wine.⁴¹

There is also evidence that the increased availability of distilled spirits in Virginia may reduce consumption of wine. There is ample evidence that consumers may substitute between classes of alcohol;⁴² it is conceivable that the relative convenience of purchasing wine in Virginia has contributed to the lower levels of sales and consumption of distilled spirits in Virginia. This tendency was noted when distilled spirits retail sales were privatized in Iowa – a time series analysis found a 9.5 percent increase in consumption and a 12.1 percent decline in wine sales at the time that distilled spirits off-premise retail sales were privatized.⁴³

This possibility will be balanced by two factors. First, VABC stores currently sell over 28,000 gallons of Virginia wine; under the privatized retail model, this wine will be absorbed into the current retail wine delivery system and offset any possible losses to substitution. Second, there will be current purchases of distilled spirits in Washington DC and Maryland that will now be made in Northern Virginia, and some of these purchases will lead to coincident purchases of wine. Given this unique cross-border factor (which didn't exist to a great degree in the Iowa experience), we think it likely that these factors will approximately balance each other out.

Other Factors Impacting Consumption or Sales

There are other demographic and social characteristics that may impact on overall levels of sales and consumption of distilled spirits. The following discusses some key factors.

Cross-border Competition

In a variety of areas, research has determined that consumers will travel significant distances to make purchases that they believe provide greater value. This has been confirmed in research on state border areas with varying sales tax rates, cigarette tax rates, and gasoline tax rates. Research on cross border competition for alcohol suggests it is more likely an issue for beer sales than it is for distilled spirits. A key factor here is the age cohort that tends to prefer beer as opposed to distilled spirits – beer consumers

⁴⁰ Distilled Spirits Council of the United States (DISCUS) presentation to the Government Reform Subcommittee, Richmond, Virginia, September 8, 2010, p. 15-16. Accessed electronically on 11/7/10 at <http://www.reform.virginia.gov/Presentations/docs/DISCUS-VAPrivatizationTestimony.pdf>

⁴¹ National Institute on Alcohol Abuse and Alcoholism, "Per Capita Ethanol Consumption for States, Census Regions and the United States, 1970-2007, accessed electronically on 11/8/10 at <http://www.niaaa.nih.gov/Resources/DatabaseResources/QuickFacts/AlcoholSales/Pages/consum03.aspx>

⁴² For example, a 2008 Gallup Poll Study of Changes in Americans' Attitudes Toward and Consumption of Alcoholic Beverages determined that, of current drinkers of alcoholic beverages, 76.8 percent had drank beer, 74.7 percent had drank wine and 72.1 percent had drank distilled spirits in the past year.

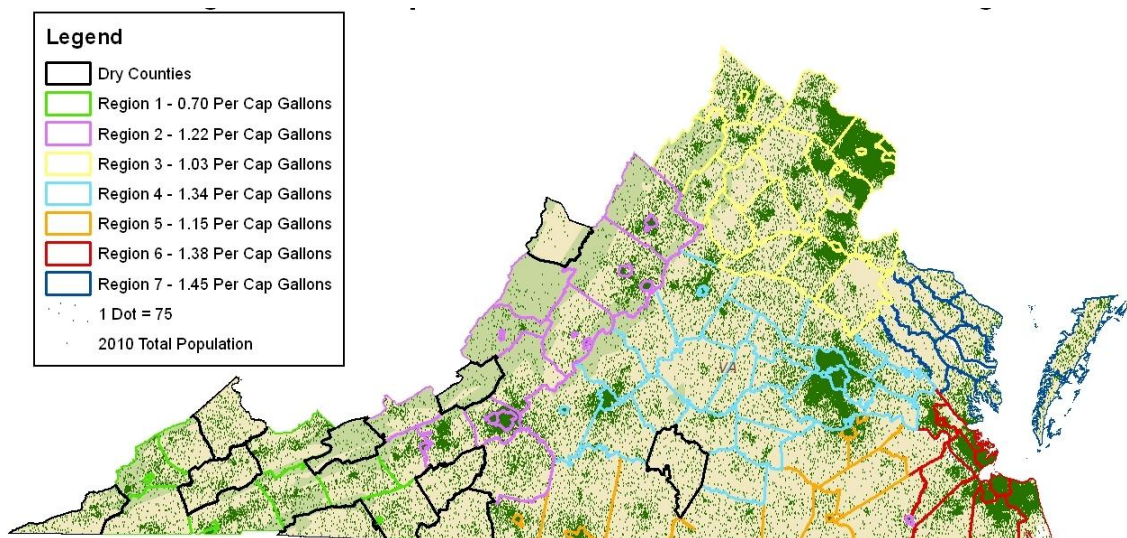
⁴³ The authors did note that the decline in wine sales at the time of spirits privatization was very small compared to the large increase in wine sales (79.2 percent) from when wine retail sales were privatized in July 1985. Holder and Wagenaar, p. 1621-1622.

tend to be younger and have less disposable income. For that consumer, traveling several miles for a reduced price may have greater perceived benefit.⁴⁴

Social Issues

Perhaps most telling for analysis is the differing social and economic make-up of Northern Virginia compared to its more southern regions. Northern Virginia is more densely populated, urban and well above the national average in median household income, while the more southern regions of the Commonwealth are more rural, have less wealth and are more likely to be social conservatives.

The more conservative nature of Southern Virginia is exemplified in the fact that nine of the ten 'dry' counties (those that do not allow the on-premises sale of liquor by the drink) are in the southern and southwestern part of the state (and the only northern dry county, Highland, is very rural and Virginia's smallest county in terms of population).⁴⁵ The following map provides information on population density, consumption and dry county status for the Commonwealth:



While income levels are generally a good predictor of expenditures on alcohol, social folkways also play a role. Aggregate data would suggest that Virginia's high level of median household income will result in increases in sales of distilled spirits; while we expect this will be the case in some areas – particularly Northern Virginia - we do not think that experience will bear out as significantly in other areas.

Over the years, the National Alcohol Survey (NAS), which was conducted in 1964, 1979 and 1984, has identified Census-defined regions as either 'Wet' or 'Dry.'⁴⁶ While there has been some movement between regions in the Wet and Dry category, the South (which includes Virginia) has consistently been characterized as a Dry region. Most recently, 2005-2006 state level estimates have been used to update the characterization of states. That analysis continues to place Virginia in the Dry state classification –

⁴⁴ T. Randolph Beard, Paula A. Gant, Richard P. Saba, "Border-Crossing Sales, Tax Avoidance, and State Tax Policies: An Application to Alcohol," *Southern Economic Journal*, July 1997, p. 300-302.

⁴⁵ The dry counties are Bland, Buchanan, Charlotte, Craig, Floyd, Grayson, Highland, Lee, Patrick and Russell, according to the Virginia Department of Alcoholic Beverage Control, Annual Report 2009 p. 22-23.

⁴⁶ Wet areas were determined to be those with relatively high per capital consumption and percentage of heavy drinkers and low levels of abstinence. See William C. Kerr, "Categorizing US State Drinking Practices and Consumption Trends," *International Journal of Environmental Research and Public Health*, 2010, Number 7, p. 269-283.

and suggests that “The Dry South states appear to be especially linked and different from the rest of the US.”⁴⁷

⁴⁷ Ibid., p. 272-276. It is notable that this classification analysis does not rely solely on consumption, but also takes into consideration the number of drinks, frequency of drinking, percentage of abstainers, etc.

Estimated Sales Outcomes from Retail Privatization

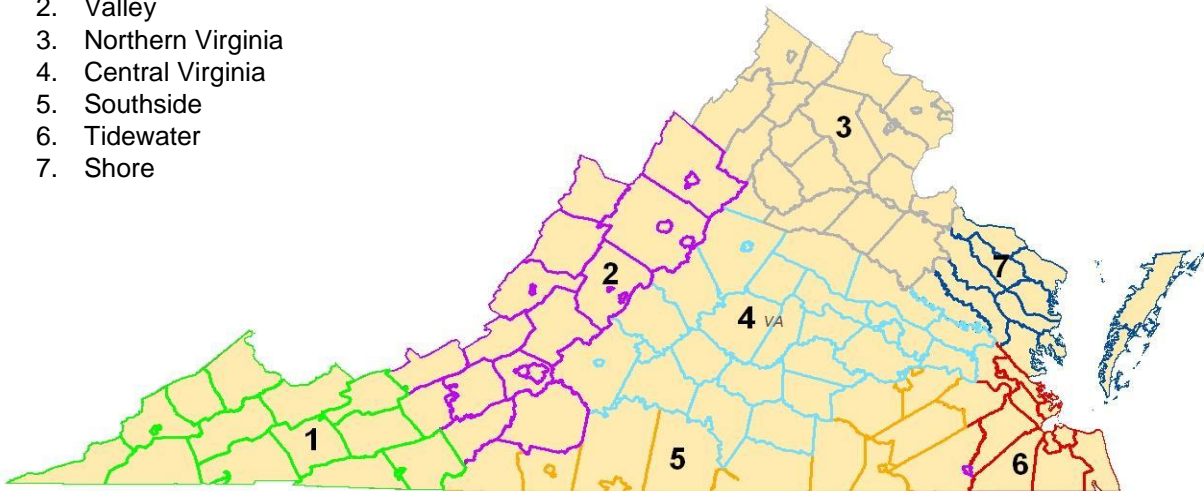
As the above discussion demonstrates, there are a variety of factors that will impact on sales (and ultimately revenue) performance under a new retail model. Besides the factors discussed, timing factors will play a critical role. As noted in the report's section on the cost of conversion, the manner in which state stores are closed – and private stores are opened - will have a material impact on overall system (and revenue) performance. This implementation phase will be impacted by a variety of factors, both endogenous and exogenous. Critical details – like the timing and success of auctions awarding the expected number of licenses in all of the proposed locations, local administrative or legal challenges to store locations and ability for the current order placement and stocking system to handle a major ramping up of private retail inventory and return of state store unsold stock – are practically impossible to model with any degree of confidence.

It should also be expected that there will be a significant spike in sales immediately prior to the opening of new private retail outlets. This will occur as the new private establishments stock their stores and begin to build inventory. This will likely occur over the approximately 30 days prior to opening and reflect expected sales in a two to four week period, depending on seasonal and other issues. For purposes of discussion, this should be assumed to be one-time revenue and is not discussed in terms of expected growth (or decline) in revenue from privatization of the retail operation in the Commonwealth.

Beyond these critical details, various regions within the Commonwealth have unique characteristics that can create significant challenges to an aggregate analysis of how the new system will operate. The Commonwealth borders both license and control states, has both urban and rural areas, wet and dry counties, and areas with well above average – and well below average – household income. Each of these factors will impact projected performance under the new models.

The current VABC divides the Commonwealth into 7 regions:

1. Southwest
2. Valley
3. Northern Virginia
4. Central Virginia
5. Southside
6. Tidewater
7. Shore



There are some unique characteristics, as it relates to overall population and income that are important for the discussion. The following table provides this information by region:

Region #	2008 Population	% of Total Population	2008 Per Capita Income	% of Total Aggregate Income
1	396,240	5.08%	\$28,623.19	3.30%
2	721,153	9.25%	\$33,773.85	7.09%
3	2,837,046	36.39%	\$56,045.43	46.28%
4	1,521,686	19.52%	\$41,441.08	18.35%
5	505,507	6.48%	\$30,572.06	4.50%
6	1,618,638	20.76%	\$39,288.36	18.51%
7	195,154	2.50%	\$34,697.35	1.97%

With over one-third of its population and nearly one-half its aggregate income, Region 3 (Northern Virginia) is likely to dominate any economic analysis for the Commonwealth.

Combining an analysis of current gallons of consumption with population and income information helps in the analysis of future retail sales opportunity. The following table provides this information by region:⁴⁸

Region	Population 21+ Years Old	Proportion of Gallons Sold	Per Capita Adult Consumption
1	277,378	0.03	1.00
2	508,246	0.09	1.64
3	2,128,091	0.33	1.51
4	1,083,859	0.22	1.88
5	352,322	0.06	1.57
6	1,146,739	0.24	1.94
7	141,365	0.03	1.96

⁴⁸ Because of data limitations, this combines information from dual sources and two different years. The data for overall Commonwealth population 21 years and over is 2009 data from the US Census Bureau. The population per region is derived from 2008 VABC data, which is the entire Virginia population, reflecting proportionality between the overall Census Bureau numbers for population over 21 and the VABC regional total population numbers.

Finally, the following presents information on the current number of store locations and likely increases based on the proposal to issue 1,000 retail franchises.

Region	Current # of VABC Stores	Est. # of Package Store Locations	Change in # of Stores	Current Wine and Beer Licenses
1	16	46	30	441
2	28	90	62	720
3	115	385	240	1727
4	74	191	103	1446
5	24	57	33	664
6	59	209	150	1228
7	18	22	4	240
Total	334	1000	622	6466

In the following discussion by region, the analysis focuses on growth beyond what would be considered 'normal growth.' Actually what constitutes 'normal growth' is worthy of discussion. As previously noted, revenue growth in recent years has likely been influenced by an increase in store locations and hours of availability (Sunday hours). The VABC also contributes to 'normal growth' by changes to prices for products. Given that consumption increases have averaged around 3.8 percent for Virginia in recent years and price increases and location expansion are likely to lead to additional revenue, a 3 percent 'natural growth' in revenue assumption seems reasonable, prior to analysis of effects of full-scale privatization of retail for distilled spirits.

Region 1: Southwest

	Gross Dollars						Annual Growth Rates				
	FY2005	FY2006	FY2007	FY2008	FY2009	FY2010	FY2006	FY2007	FY2008	FY2009	FY2010
Southwest Total	\$ 24,144,039	\$ 25,927,935	\$ 27,211,827	\$ 29,037,282	\$ 30,274,148	\$ 30,757,151	7.4%	5.0%	6.7%	4.3%	1.6%
Southwest New	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	0.0%	0.0%	0.0%	0.0%	0.0%
Southwest Existing	\$ 24,144,039	\$ 25,927,935	\$ 27,211,827	\$ 29,037,282	\$ 30,274,148	\$ 30,757,151	7.4%	5.0%	6.7%	4.3%	1.6%

The second smallest region in terms of population, it has the least population density of any region.⁴⁹ It also contains five of the ten 'dry' counties in Virginia. Its per capita income is also the lowest of any of the regions. Given these factors, it is likely that additional retail outlets will not appreciably increase sales or consumption beyond 'natural growth.'

Region 2: Valley

	Gross Dollars						Annual Growth Rates				
	FY2005	FY2006	FY2007	FY2008	FY2009	FY2010	FY2006	FY2007	FY2008	FY2009	FY2010
Valley Total	\$ 48,082,510	\$ 51,784,164	\$ 55,108,812	\$ 58,426,192	\$ 60,060,551	\$ 60,536,036	7.7%	6.4%	6.0%	2.8%	0.8%
Valley New	\$ -	\$ -	\$ 803,452	\$ 2,250,715	\$ 2,563,241	\$ 2,723,687	0.0%	0.0%	180.1%	13.9%	6.3%
Valley Existing	\$ 48,082,510	\$ 51,784,164	\$ 54,305,361	\$ 56,175,477	\$ 57,497,310	\$ 57,812,349	7.7%	4.9%	3.4%	2.4%	0.5%

⁴⁹ For a discussion of gravity model's application to alcohol purchase decisions: Room, Robin, "Tsunami or ripple? Studying the effects of current Nordic alcohol policy changes," Paper presented at the 30th Annual Alcohol Epidemiology Symposium of the Kettli Bruun Society for Social and Epidemiological Research on Alcohol in Helsinki, Finland, May 31 – June 4, 2004. Accessed electronically on November 11, 2010 at www.robinroom.net/tsunami.doc

Population density is a useful measure, as distance to travel to purchase/consume is an important factor in a choice of what/where to shop or consume. In retail and similar operations, gravity models are often used to determine the available market and the likelihood to make purchases. A retail gravity model is based on the theory that any consumer's choice of store or activity will be based on two primary considerations - convenience (travel time) and venue attractiveness. Of the two, convenience is generally more heavily weighted.

While larger in terms of population and income, the Valley Region is still relatively dispersed; it has one primary population center – Roanoke. Its per capita income and median household income is below the state average. Its performance in recent years, in terms of revenue growth, has been the weakest of the regions. Given this set of circumstances, it is unlikely that additional store locations will appreciably change its current revenue growth levels.

Region 3: Northern Virginia

	Gross Dollars						Annual Growth Rates				
	FY2005	FY2006	FY2007	FY2008	FY2009	FY2010	FY2006	FY2007	FY2008	FY2009	FY2010
NOVA Total	\$ 146,354,759	\$ 157,575,422	\$ 167,746,243	\$ 178,101,516	\$ 185,172,688	\$ 190,851,011	7.7%	6.5%	6.2%	4.0%	3.1%
NOVA New	\$ 2,017,386	\$ 7,121,316	\$ 17,266,372	\$ 25,896,886	\$ 32,395,929	\$ 35,264,624	253.0%	142.5%	50.0%	25.1%	8.9%
NOVA Existing	\$ 144,337,374	\$ 150,454,106	\$ 150,479,871	\$ 152,204,629	\$ 152,776,759	\$ 155,586,388	4.2%	0.0%	1.1%	0.4%	1.8%

Northern Virginia is the anomaly among the seven regions. It has nearly twice the population of any other region, has the highest per capita and household income and ready access to retail outlets for distilled spirits in Washington DC and Maryland. Indeed, its population centers with the highest median household income (in fact, the highest in all of Virginia), border the District or the state of Maryland. It is also densely populated. At the same time that it has nearly twice the population 21 or over of the next biggest region (Region 6), it has just 55 percent more retail outlets than the region with the next highest number (Region 4). As noted before, the region has also added more additional stores than any other region, and these additions have boosted its percentage of sales growth above the rest of the regions combined during recent years.

Given its high levels of income, density and recent experience, there is a very strong probability that sales in the region will increase with additional retail locations. The region is also home to multiple ‘big box’ retail locations that are likely to pursue licenses. It is conceivable that these locations will value a retail distilled spirits franchise both for the retail mark-up and for the opportunity to boost foot traffic. If this is the case, it is likely that there will be strong price competition in the densely populated, high income portions of the region, and this will draw consumers and boost overall sales.

Given the factors cited above, this is the one region in Virginia where a strong case can be made that levels of consumption (measured in terms of sales volume) may at some point in time approach the national average. If national ‘big box’ stores with a proven track record and experience with retail sales of distilled spirits obtain a significant share of the licenses, the confidence level for this growth assumption increases.

Region 4: Central Virginia

	Gross Dollars						Annual Growth Rates				
	FY2005	FY2006	FY2007	FY2008	FY2009	FY2010	FY2006	FY2007	FY2008	FY2009	FY2010
Central Total	\$ 137,686,415	\$ 147,215,800	\$ 157,295,397	\$ 165,848,680	\$ 170,709,692	\$ 170,997,251	6.9%	6.8%	5.4%	2.9%	0.2%
Central New	\$ 324,636	\$ 1,488,029	\$ 6,164,234	\$ 8,710,907	\$ 10,083,182	\$ 11,904,847	358.4%	314.3%	41.3%	15.8%	18.1%
Central Existing	\$ 137,361,779	\$ 145,727,771	\$ 151,131,163	\$ 157,137,774	\$ 160,626,510	\$ 159,092,405	6.1%	3.7%	4.0%	2.2%	-1.0%

Unlike several other regions, border issues are not a relevant concern for the Central Virginia Region. With Richmond as its anchor, it trails only the Northern Virginia region in terms of population and per capita personal income. It also trails only Northern Virginia in terms of population density. That said, the difference between being number one and number two in these categories is significant. In recent years, this region’s growth in sales has trailed the Commonwealth as a whole and was negative in FY 2010.

This region already has the second largest number of retail store locations in the Commonwealth. Given its lagging performance, it is difficult to make a case that additional locations are going to lead to growth that exceeds current estimates. It is plausible to suggest that this region aligns more with the ‘dry state’ characteristics of the rest of the South and is not likely to experience national per capita consumption average levels.

Region 5: Southside

	Gross Dollars						Annual Growth Rates				
	FY2005	FY2006	FY2007	FY2008	FY2009	FY2010	FY2006	FY2007	FY2008	FY2009	FY2010
Southside Total	\$ 18,691,302	\$ 19,287,949	\$ 20,106,123	\$ 20,744,665	\$ 21,424,186	\$ 21,510,815	3.2%	4.2%	3.2%	3.3%	0.4%
Southside New	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	0.0%	0.0%	0.0%	0.0%	0.0%
Southside Existing	\$ 18,691,302	\$ 19,287,949	\$ 20,106,123	\$ 20,744,665	\$ 21,424,186	\$ 21,510,815	3.2%	4.2%	3.2%	3.3%	0.4%

This region has the second lowest regional income level, the third lowest population and low population density. Its southern location also suggests that it more aligns with 'dry' as opposed to 'wet' attitudes on alcohol. Given its less than average growth in revenue in recent years, it is unlikely that privatization will change current growth estimates for the region.

Region 6: Tidewater

	FY2005	FY2006	FY2007	FY2008	FY2009	FY2010	FY2006	FY2007	FY2008	FY2009	FY2010
Tidewater Total	\$ 136,241,312	\$ 146,567,522	\$ 155,635,071	\$ 163,839,676	\$ 170,492,339	\$ 172,639,637	7.6%	6.2%	5.3%	4.1%	1.3%
Tidewater New	\$ -	\$ 355,710	\$ 4,101,278	\$ 6,458,351	\$ 6,811,171	\$ 6,854,123	0.0%	1053.0%	57.5%	5.5%	0.6%
Tidewater Existing	\$ 136,241,312	\$ 146,211,812	\$ 151,533,794	\$ 157,381,325	\$ 163,681,167	\$ 165,785,514	7.3%	3.6%	3.9%	4.0%	1.3%

This region contains the Hampton Roads population centers of Virginia Beach, Norfolk, Hampton and Portsmouth. It has the second largest population of any region and also the greatest population density. It, like Northern Virginia, is likely underserved in terms of available retail outlets considering population and density. While these would suggest higher rates of sales with privatization, there are some mitigating factors. First, it does not have as ready access to non-state stores. While there is some proximity to North Carolina, there is not a large urban center on the border. Further, North Carolina is also a control state, and its overall mark-up is high.⁵⁰

The area also has a very high concentration of military personnel, and sales at military bases are likely to be a competitive factor that will inhibit the growth of sales with additional locations. Sales at military bases make up approximately 5 percent of total sales in Virginia,⁵¹ and it is likely that most of those sales occur in this and the Northern Virginia region. Given that the military is the leading employer in several of the major cities in this region, it is likely that this will constrain possible growth. Finally, the overall income of the region is significantly lower than for Northern Virginia. When weighing the various factors, it is likely that there will be an increase in sales in the region, but it will not be nearly as large an increase as in the Northern Virginia region.

Region 7: Shore

	Gross Dollars						Annual Growth Rates				
	FY2005	FY2006	FY2007	FY2008	FY2009	FY2010	FY2006	FY2007	FY2008	FY2009	FY2010
Shore	\$ 3,391,448	\$ 3,607,554	\$ 3,735,199	\$ 3,979,116	\$ 4,170,512	\$ 4,242,931	6.40%	3.50%	6.50%	4.80%	1.70%
Shore New	\$ -	\$ 1,027,716	\$ 1,049,139	\$ 1,138,666	\$ 1,216,221	\$ 1,241,941	0.0%	2.1%	8.5%	6.8%	2.1%
Shore Existing	\$ 3,391,448	\$ 2,579,838	\$ 2,686,060	\$ 2,840,450	\$ 2,954,291	\$ 3,000,990	-23.9%	4.1%	5.7%	4.0%	1.6%

The smallest region, one with less than average income and no cross-border issues, it is likely that it will not exhibit significantly different consumption and sales rates than have been experienced in recent years.

⁵⁰ According to the National Alcoholic Control Beverage Association, 2009 Survey, the mark-up for the State of North Carolina is 85 percent.

⁵¹ According to David Ozgo, Chief Economist for the Distilled Spirits Council, the military is selling 200,000 cases of distilled spirits in Virginia annually – about 5.1 percent of total 2009 state volume. Nationwide, military sales account for around 0.02 gallons per adult, but the Virginia figure would be 0.084 gallons, thus adding 0.064 gallons to Virginia adult per capita consumption.

Impact on Sales and Revenue

The region-by-region analysis leads us to conclude that for many parts of the Commonwealth, the introduction of additional store locations will not dramatically increase sales levels above 'natural growth.' In fact, depending on price issues, relating to perceived retail mark-up, it is possible that some regions will see flat or declining growth. At the same time, privatization may also lead to a reduction in costs borne by the Commonwealth in terms of retail store personnel, inventory, store leases and other expenses.

For purposes of discussion, it is also important to note the difference between on-premise and off-premise retail sales of distilled spirits. On-premise sales, which account for approximately 18 percent of retail sales, will not be materially impacted by additional off-premise retail locations (other than perhaps having greater opportunities to re-stock product). Thus, growth in consumption or sales is likely to occur in the 82 percent of off-premise sales.

We believe that at least two regions will likely experience consumption and/or sales increases that will result in additional revenue above the baseline projections for VABC for future fiscal years. The primary revenue growth will likely occur in Northern Virginia. Given its wealth, population density and other social and demographic characteristics, we believe that it will, within a reasonable timeframe from full implementation of the targeted number of private retail distilled spirits sales locations, see an increase in sales that might move the region toward national per capita consumption levels.

Given that this area is likely to be served by large private retailers with extensive experience with retail sale of alcohol, we would expect the market to be as or more competitive in terms of price and service with surrounding areas as currently exists; given that assumption, we would expect higher consumption levels within six months of full implementation of retail privatization.

The Tidewater region is also likely to experience revenue growth above baseline projections. Its population density and relatively higher income levels in the Hampton Roads area would suggest that it would experience additional revenue growth with additional retail locations. However, the large percentage of its workforce that have access to competing stores on military bases suggests that this growth will not match aggregate growth rates from other states that privatized their retail operations; we would expect a growth rate in the range of an additional 25 to 50 percent of the current expected rate of growth.

Arriving at a concrete single estimate of likely impact on sales and revenue growth is, for the variety of reasons already discussed, fraught with risk. We believe a better approach is to identify a reasonable range of possible outcomes associated with key factors that will (or will not) drive increases in consumption or revenue. The following identifies these consumption growth levels, our degree of confidence in the estimate, and the factors that would be most likely to impact that estimate:

No Growth (0.0% growth) 5 percent chance

This forecast would likely result from a scenario involving significant price increases following privatization, which would trigger reduced consumption, or a double-dip recession that led to declines in regional employment, particularly in Northern Virginia or the Hampton Roads regions. Given that the Commonwealth has experienced some level of consumption growth during the last recession, we view this scenario as unlikely. While a significant price increase may trigger reduction in demand, we would note that some research suggests demand is less sensitive to price increases in control states.

Minimal Additional Growth (3.0% growth) 20 percent chance

This forecast would likely result from the tripling of store locations driving some convenience sales but not a significant repatriation from sales largely occurring in Maryland and Washington DC. In this scenario, distilled spirits consumers have built buying relationships with other stores and locations that are convenient for them – perhaps near their place of employment – and are not likely to make a marked

change in their buying habits. This scenario may also be the result of Northern Virginia's purchasing behavior more resembling the rest of the State – and the South – than its higher consuming northern neighbors in Washington DC and Maryland.

Moderate Additional Growth (5.0% growth) 45 percent chance

This forecast would rely on the tripling of store locations driving convenience sales and also a significant amount of repatriation from sales in Maryland and Washington DC. It would rely on consumption levels in Northern Virginia moving approximately half way toward the national average and more closely correlate with expected levels of consumption for its level of household income and educational attainment. This may also include some repatriation of wine sales for consumers who make dual purchases, but this factor may not be significant, as per capita levels of wine consumption are already above the national average in Virginia (a possible indicator of the value of convenience to consumers), and the possibility that some substitution of wine for distilled spirits may currently exist that will be less likely to occur with more convenient access to distilled spirits. We view this scenario as most likely. Risks associated with achieving this level of consumption growth include a return to economic recession, significant price increases or wholesale mark-up that limits the retail budgets for advertising and marketing.

Strong Additional Growth (7.0% growth) 20 percent chance

This forecast would rely on the tripling of store locations driving convenience sales, a significant amount of repatriation from sales in Maryland and Washington DC, strong retail price competition among 'big box' and other large retailers that reduces current prices on popular items (thus increasing demand) and some level of wine repatriation because of convenience dual purchasing. This would also likely occur through distilled spirits per capita consumption levels in Northern Virginia approaching national averages.

Very Strong Additional Growth (10.0% growth) 10 percent chance

This forecast would rely on the tripling of store locations driving convenience sales, a significant amount of repatriation from sales in Maryland and Washington DC, strong retail price competition among 'big box' and other large retailers that reduces current prices on popular items (thus increasing demand), some level of wine repatriation because of convenience dual purchasing. This level would likely require distilled spirits per capita consumption levels in Northern Virginia to behave similarly to consumption levels of wine, which are above the national average.

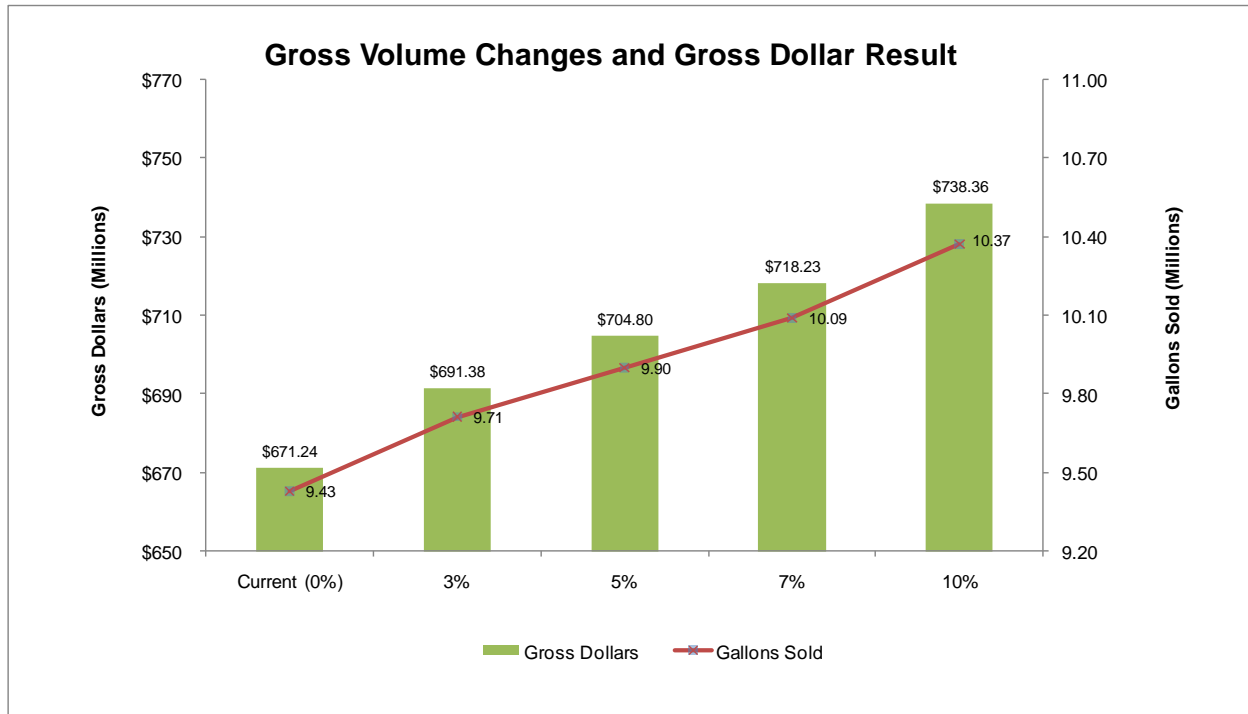
The following reflects these forecasts:

Total Retail Price of Goods	
Total Cost of Goods	\$34.78
Handling and Rounding	\$0.55
VA ABC Mark-Up @ 69%	\$24.00
State Excise Tax @ 20%	\$11.86
Total Price of Goods	\$71.19

Statewide	Gallons Sold	Per Gallon	Gross Dollars
Total Distilled Spirits Sold	9,428,899	\$71.19	\$671,240,285
Assumed Increase			
0.0%	9,428,899	\$71.19	\$671,240,285
3.0%	9,711,766	\$71.19	\$691,377,494
5.0%	9,900,344	\$71.19	\$704,802,300
7.0%	10,088,922	\$71.19	\$718,227,105
10.0%	10,371,789	\$71.19	\$738,364,314

Source: VABC

Note: Inclusive of Excise Tax, all figures represent full privatization and market coverage by licensed retailers; assumes composition of gallons sold remains unchanged and prices remain constant.



In either the Agent or License model, throughout the Commonwealth, there will be a transition period for public and private sector retailers and consumers. While on the one hand consumers will be getting used to a new set of purchasing choices and decisions, retailers will also be learning about the market and the most effective ways to serve their customers. In the Agent Approach, the greater mark-up provided to the Commonwealth will act as a buffer against what may well be aggravating factors involved in the transition. On the other hand, many 'big box' retailers in the License Approach will have larger promotional and product discount budgets designed to bring consumers into their stores, which will likely lead to higher sales volumes at the start to help mitigate these aggravating transitional factors.

Cost of Conversion

The Commonwealth currently operates one of the largest chains of retail stores in the state, with more than half a billion dollars in annual sales. In either of the approaches being reviewed, this system would be largely eliminated. The assets of the current system are discussed below.

Employees

VABC operates 334 retail stores across the state. These stores employ a total of 612 full time staff, including:

▪ Regional Managers	19
▪ Store Managers	303
▪ Assistants	230
▪ Relief Manager (Floaters)	41
▪ Store Clerks	<u>19</u>
	612

In addition, the stores employ between 1,500 and 1,700 part-time employees, predominantly store clerks. The statutory requirements and the strategies for terminating these employees are discussed below.

Inventory

These stores have approximately \$40 million of inventory, predominantly liquor, but also including Virginia wine, mixers and other accessories. This inventory will have to be re-distributed to other VABC stores for liquidation or returned to the warehouse to be re-sold to private licensees.

Fixed Equipment

With a very few exceptions discussed below, VABC stores reside in leased space that is fitted with shelving and display fixtures, in some cases limited refrigeration equipment, and a small amount of office furniture and implements to move stock. Each store also has a modest amount of administrative and cleaning supplies and equipment. In addition, each store has cash register and computer equipment that is part of the Department's Point of Sale (POS) system. With the exception of POS equipment, most of the fixed furnishings of the stores have been fully depreciated and is of minimal value. Other than the POS system, it is likely that the most cost-advantageous way of liquidating this equipment will be to dispose of these assets at the store level or to simply abandon it.

Vehicles

The stores currently use 15 leased vehicles and 3 owned vehicles for regional managers. Under both scenarios, VABC envisions retaining current regional managers as account representatives. Depending on the number of establishments, it is possible this number could increase.

Gift Cards

All VABC stores sell gift cards, which can be purchased in any amount from \$10 to \$500. At present, there is approximately \$171,000 in gift cards outstanding. These cards will have to be liquidated or refunded to the cardholders. The funds from these card purchases are held in escrow store accounts. Accordingly, liquidation of these card balances, while presenting administrative challenges, will have no fiscal impact. It is possible that an arrangement could be made with new licensees to accept these cards in order to garner market share of former VABC store customers.



Leases

Most of the VABC stores have five year leases, which expire on a rolling basis. VABC staff has indicated that all store leases contain a clause which allows them to be cancelled either for lack of appropriation, or

based on legislation that eliminates the VABC retail function. VABC owns the property at 17 current locations. It is assumed that these properties will be sold, as detailed in the section below.

Impact on Warehouse Operations

Assuming the sales volume stays within a 10 percent tolerance, we believe the current VABC warehouse has the storage capacity to support either the Agent or Licensee operations, and that the existing semi-automated item selection, packing and truck loading space and equipment will be sufficient to support deliveries to the 1,000 outlets contemplated under either approach.

However, additional shifts will be required. At present, to support 334 retail outlets, the warehouse conducts shipping and receiving operations one shift per day, five days per week. Under privatization, the number of establishments for delivery will triple, but with relatively constant volume, the number of cases per delivery will be smaller. As the size of orders decreases, the efficiency of the warehouse's order production will decrease as well. The likelihood of split-cases and other extra-handling items to be picked and packed will increase. Accordingly, for estimation purposes, the PFM Team assumes that the inherent workload of the warehouse picking/packing operation and the number of truck routes for delivery will double, requiring a second shift in the warehouse and an increase in the truck fleet.

Additionally, there will be a distribution and warehouse cost associated with the logistics of decommissioning VABC stores, as inventory is transferred between stores and is returned to the warehouse for re-stocking. Since VABC owns the store inventory, some additional procedures will be required to assure re-stocked items are the first sold to new licensees or delivered to agency stores. It may be possible to transfer some or all Store inventory between closing VABC stores and opening private outlets. However, the costs and logistics of such procedures were not analyzed as part of this engagement.

The exact configuration of this additional workload – whether it involves a night shift and/or weekend operation - will require an optimization analysis to define. For the purpose of this engagement, relying on analysis performed by VABC central staff, we believe it is reasonable to assume an extra \$2.6 million in operating expense.

Liquidation of Real Estate

While most of the VABC Store locations are in leased space, VABC owns 17 properties around the state. Of those 17 properties, two support enforcement operations as well. We recommend that all 17 properties be liquidated. The chart below shows the estimated market value of the properties and associated costs. For the purposes of Budget Neutrality, we have assumed that the enforcement offices in Hampton and Annandale would move to leased space, and a cost allowance of \$15 per square foot has been made for 5,000 square foot offices at each of those two locations.

ABC Owned Properties <i>current assessed values</i> Source: DABC Chief Financial Officer			
	Store #	Store Location	Assessed Value
1	117	Lynchburg	\$ 635,000
2	119	Alexandria	\$ 10,734,182
3	121	Fredericksburg	\$ 374,200
4	122	Staunton (n/a)	\$ 265,000
5	145	Harrisonburg	\$ 640,900
6	165	Chesapeake	\$ 232,000
7	181	Middleburg	\$ 742,700
8	187	Richmond	\$ 367,000
9	195	Christiansburg	\$ 265,000
10	201	Abingdon (n/a)	\$ 265,000
11	206	Big Stone Gap	\$ 181,000
12	227	Gordonsville	\$ 97,400
13	236	Annandale	\$ 1,051,810
14	244	Hampton	\$ 929,600
15	280	Chesapeake	\$ 1,914,100
16	293	Mount Jackson	\$ 97,400
17	350	Chesterfield	\$ 437,000
18	360	Richmond	\$ -
			\$ 19,229,292
Less costs and commissions of 12%			<u>\$ 2,307,515</u>
			\$ 16,921,777
Net Asset Value			\$ 16,921,777

Cost of Employee Severance

The Virginia Workforce Transition Act of 1995 (WTA) is included in Title 2.2 of the Code of Virginia. It provides protections and benefits for State employees that leave State service through “Involuntary Separation.” The statute provides, in part:

“If, as of the date the employee is terminated from employment or placed on leave without pay-layoff or equivalent status, reemployment within his agency or institution or any other agency or institution of the executive branch of state government is not possible because there is no available position for which the employee is qualified or the position offered to the employee requires relocation or a reduction in salary, then the employee shall be deemed to be involuntarily separated. If such employee is otherwise eligible, he shall be entitled, under the conditions specified, to receive the transitional severance benefit conferred by this chapter.”

Benefits under WTA depend on an employee’s weekly wages the years of service. On the date of involuntary separation, an eligible employee with:

- a. Two years' service or less to the Commonwealth shall be entitled to receive four weeks of salary;
- b. From three years through nine years of consecutive service, four weeks of salary plus one additional week of salary for every year of service over two years;

- c. From ten years through and including fourteen years of consecutive service, twelve weeks of salary plus two additional weeks of salary for every year of service over nine years; or
- d. Fifteen years or more of consecutive service, two weeks of salary for every year of service, not to exceed thirty-six weeks of salary.

Based on data developed by the VABC Chief Financial Officer, the WTA costs for the 591 full-time classified employees would be \$7,165,129. Part-time employees are not eligible for WTA benefits. However, if they have sufficient qualifying wages, they are eligible for Unemployment Compensation (Title 60.2 of the Virginia Code). Using information provided by VABC, the chart below shows the maximum fiscal exposure for the separation of all employees that support store operations:

VABC Retail Store Employees Estimated Cost of Severance								
Employee Type	Number of Employees	WTA Benefit	Maximum U.I. *	Annual Leave	Sick Leave	Life Insurance	Health Insurance	Totals
Full Time Classified	591	\$ 7,165,129	\$ 5,490,716	\$ 1,684,470	\$ 380,347	\$ 202,469	\$ 4,893,636	\$ 19,816,767
Part-Time	1,500		\$ 8,281,532					\$ 8,281,532
Total	2,091	\$ 7,165,129	\$ 13,772,248	\$ 1,684,470	\$ 380,347	\$ 202,469	\$ 4,893,636	\$ 28,098,299

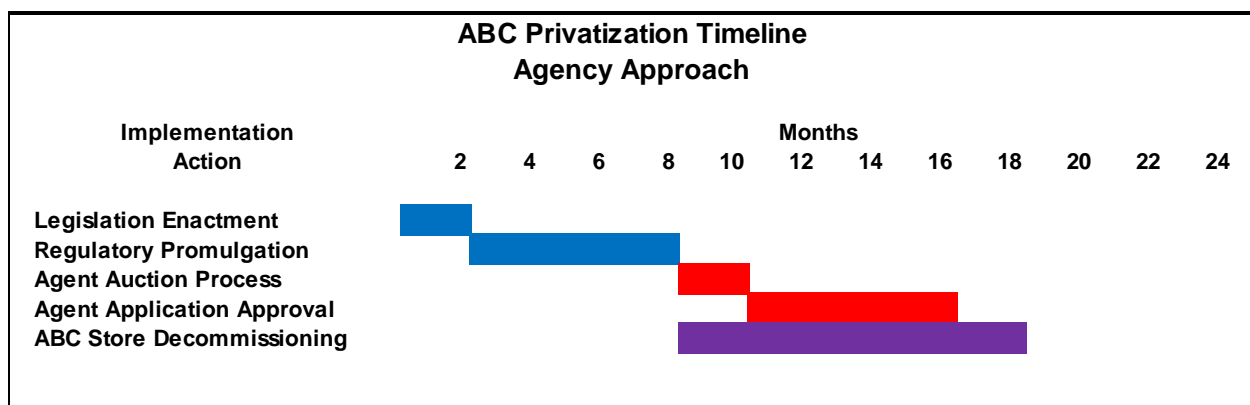
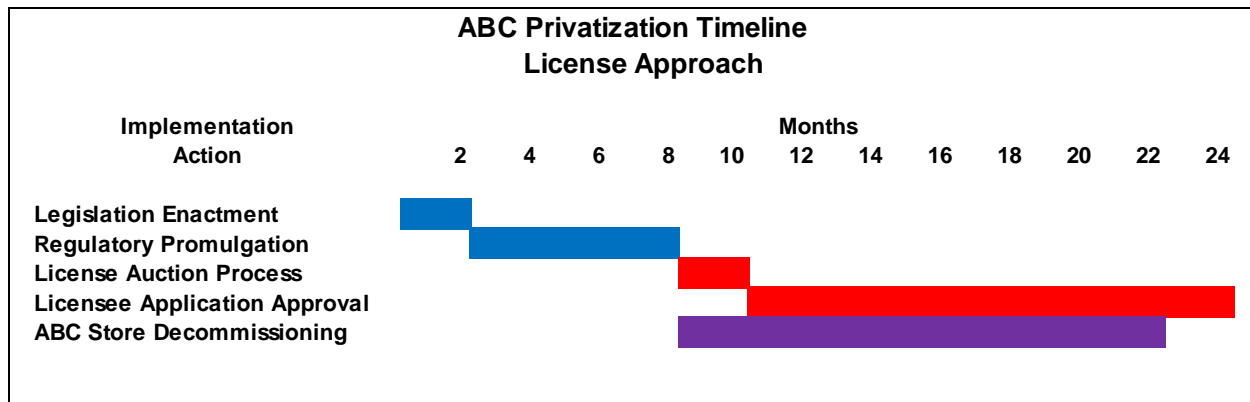
* Less \$1.292m for 100 Early Retirement

Source: VABC

While private employers in Virginia pay into an Unemployment Insurance (U.I.) Trust Fund, State government agencies essentially self-insure for unemployment benefits. Accordingly, VABC would have to pay the U.I. benefits for eligible full and part-time employees who are separated from service. An analysis of likely employee separations by VABC and the Department of Planning and Budget (DPB) shows that 137 current VABC store employees would be eligible for accelerated retirement benefits. For employees electing the retirement option, VABC will pay the WTA payments to Virginia Retirement System (VRS). However, these employees would have no U.I. costs. In performing the calculations above, PFM assumes that 100 of these employees will elect the retirement benefit, and we have reduced U.I. costs by \$1.292 million.

A number of actions can be taken to mitigate the non-WTA cost of severance. These include:

- Government Re-employment. A common practice in State service, employees targeted for layoff are targeted for re-employment in other departments and agencies. The clerical nature of the bulk of VABC employees matches well with a variety of other State job titles in human service, motor vehicle and other agencies with field offices around the state and routine employee turnover patterns.
- Closure Staging. As discussed in the section below, the VABC store decommissioning is likely to occur over a period of months. Costs can be reduced by carefully managing the timing of store closures, and systematically using vacancy controls and proximate store transfers, separation through attrition, in part to new private liquor licenses ramping-up.



Decommissioning Timeline

Based on the steps involved, the conversion of Virginia liquor sales from VABC Stores to private retailers will take time. The major transition elements are:

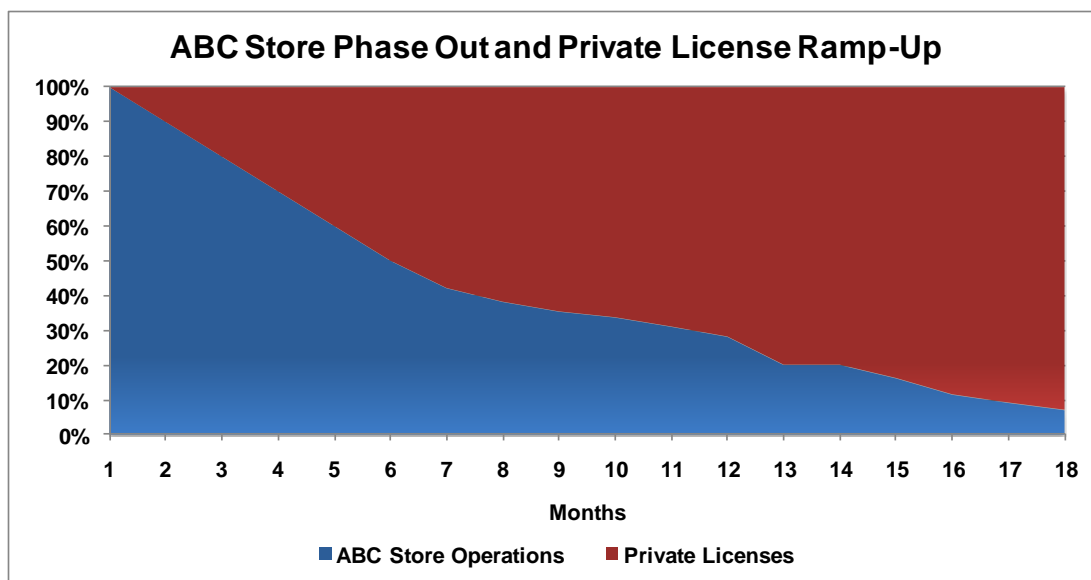
- Enactment of Legislation and Promulgation of Rules and Regulations. **Six months.** Defining and promulgating the regulatory framework under which a privatized industry will operate is a complicated task, fraught with numerous technical problems and policy issues that must be addressed. While the use of Emergency Regulations may speed this process somewhat, based on interviews with VABC officials, the PFM team believes it is likely to take close to six months to perfect the regulatory guidance necessary for the industry to operate long-term.
- Conduct of the License or Agent Auctions. **Two Months.** The design and execution of the competitive process required to select Licensees or agents is critical to the long-term fiscal viability of the privatization plan. It should be noted that VABC believes the license auction process will be done in series, based on a payment maximization strategy that has yet to be devised. While much of this process would run concurrently with the license application approval process, it will slow the transition to some extent.

To date, other state experience with auctions is limited. For example the State of Florida holds a lottery for each new license (based upon population growth). Each interested bidder pays a \$100 entry fee, regardless of the size of the operation. The winner gains the right to apply for a license. Upon licensing, the winner must hold the license for at least three years or pay the state a fee that is 15 times the license fee (tied to consumption). West Virginia did not set a minimum for their licenses upon initial bid. As a result, there were several licenses that were not bid upon.

The State went through several rounds of bidding before it was able to sell the desired number of licenses. The State developed a 2010 re-bid formula that ties to the 2000 minimum bid price for a given license, which is not particularly helpful for determining what should be the initial bid floors.

- Licensee Application Processing. Three to Six Months. Although most of the new spirits licensees are likely to be current wine and beer retailers, VABC officials advise that a new application process will be required. This process, which includes a business background investigation as well as a required 30 day comment period for local governments, and an unspecified review period for the public at large, typically takes 30 to 90 days to complete. However, officials believe objections from governments and citizens can be expected at many of the locations. In this case, a hearing before a VABC Administrative Law Judge (ALJ) is required. If the complainant is still not satisfied, they may appeal to the courts. In cases like this, officials indicate, the process can drag on for months.
 - Accordingly, given the volume of workload created by the addition of up to 1,000 new licenses to the agency's normal activity, we believe it is reasonable to assume that the majority of new license approvals will fall into the three to six month timeframe, with a few sooner and some portion requiring protracted processing.
 - It should be noted that, with Legislative approval, more expedited procedures could be used; including making provisional license awards to current beer/wine licensees.
- VABC Store Decommissioning. Two Months. Given 30 to 60 days notice, landlord and employee notification, inventory and store stock removal, public notification and liquidation or return of fixtures and equipment to the VABC warehouse can be accomplished in an orderly fashion.

Given these factors, it is likely that the decommissioning of VABC stores and the reciprocal ramp-up of private outlets will require about 18 months to complete; with the majority of the transition taking place in the first year. While the available data does not support a definitive forecast, the PFM team believes it is reasonable to assume that the transition will resemble the chart below:



Impact of License Approach on State Operating Costs and Revenues

A critical element to the fiscal success of the transition to private operation is the need to maintain sales volume, in order to support the wholesale mark-up assumptions as a stable flow of excise and sales tax revenue. Accordingly, it will be critical to maintain service levels, especially during the heavy-volume holiday months. While the phasing models are not that sensitive, and essentially show the transition as a straight line, it is likely that few, if any changes would actually be made in November or December due to the heightened risk of an adverse sales impact.

For the purpose of this illustration, the PFM team assumes that the maximum U.I. costs will be required, and that the WTA expense will be uniform. Additionally, we for purposes of the consumption analysis, we assume that there is no change – positive or negative – in sales volume, and that retail sales for Store phase-out and Licensee phase-in will be linear and in sync.

Using the phase-in assumption depicted above, the PFM team assumes that the implementation of privatization under either plan will begin at the start of FY 2011-12. The presumption is that many of the Level One licensees and a number of the Level Two and Three licensees will be able to capitalize their franchise fee and be ready to apply as soon as regulations are in place. Moreover, these larger, more sophisticated retailers will either be familiar with licensure procedures, or will retain counsel that are, so that the due diligence portion of license processing will proceed expeditiously. It is also assumed that some number of these licensees will face local government or citizen opposition, which will protract the approval process while hearings and possibly litigation are concluded. Lastly, it is assumed that Level Three and Four applicants will take longer to make their way through the process.

As a result, the assumed phase-out forecast, shown in the chart below, shows that only 20 percent of licensees – roughly 200 establishments – will be open in the first three months, and that in order to maintain consumer access and revenue flow, only 20 percent of VABC stores – roughly 65 – will close. As FY 2012 advances, the pace of licensee openings and store closures will accelerate and by the end of the fiscal year in June 2012 over 700 of the private licensees will be open and nearly 240 VABC stores will be closed.

ABC License Transition Costs (Operating Costs + Severance Costs + Warehouse and Admin. - License Revenue)												
Mnth #	ABC Store Operations	Private Licenses	ABC Store Operations	Warehse. Cost	ABC Admin. Cost	Totals	WTA Cost	UI Cost *	Total Cost	Private Licenses	Costs Less Lic. Fees	SFY 2012 Cost
1	100%	0%	\$7.1750	\$0.467	\$0.083	\$7.72500	\$0.0000	\$0	\$7.7250	\$0	\$7.7250	
2	90%	10%	\$6.4575	\$0.467	\$0.083	\$7.00750	\$0.7165	\$1.3772	\$9.1012	\$0.250	\$8.8512	
3	80%	20%	\$5.7400	\$0.467	\$0.083	\$6.29000	\$1.4330	\$2.7545	\$10.4775	\$0.500	\$9.9775	
4	70%	30%	\$5.0225	\$0.467	\$0.083	\$5.57250	\$2.1495	\$4.1317	\$11.8537	\$0.750	\$11.1037	
5	60%	40%	\$4.3050	\$0.467	\$0.083	\$4.85500	\$2.8661	\$5.5089	\$13.2300	\$1.000	\$12.2300	
6	50%	50%	\$3.5875	\$0.467	\$0.083	\$4.13750	\$3.5826	\$6.8861	\$14.6062	\$1.250	\$13.3562	
7	45%	55%	\$3.2288	\$0.467	\$0.083	\$3.77875	\$3.9408	\$7.5748	\$15.2943	\$1.375	\$13.9193	
8	40%	60%	\$2.8700	\$0.467	\$0.083	\$3.42000	\$4.2991	\$8.2634	\$15.9824	\$1.500	\$14.4824	
9	36%	64%	\$2.5830	\$0.467	\$0.083	\$3.13300	\$4.5857	\$8.8143	\$16.5329	\$1.600	\$14.9329	
10	33%	67%	\$2.3678	\$0.467	\$0.083	\$2.91775	\$4.8006	\$9.2274	\$16.9458	\$1.675	\$15.2708	
11	31%	69%	\$2.2243	\$0.467	\$0.083	\$2.77425	\$4.9439	\$9.5029	\$17.2211	\$1.725	\$15.4961	
12	28%	72%	\$2.0377	\$0.467	\$0.083	\$2.58770	\$5.1302	\$9.8610	\$17.5789	\$1.790	\$15.7889	\$54.20
13	20%	80%	\$1.4350	\$0.467	\$0.083	\$1.98500	\$5.7321	\$11.0178	\$18.7349	\$2.000	\$16.7349	
14	20%	80%	\$1.4350	\$0.467	\$0.083	\$1.98500	\$5.7321	\$11.0178	\$18.7349	\$2.000	\$16.7349	
15	17%	83%	\$1.2198	\$0.467	\$0.083	\$1.76975	\$5.9471	\$11.4310	\$19.1478	\$2.075	\$17.0728	
16	15%	85%	\$1.0763	\$0.467	\$0.083	\$1.62625	\$6.0904	\$11.7064	\$19.4231	\$2.125	\$17.2981	
17	10%	90%	\$0.7175	\$0.467	\$0.083	\$1.26750	\$6.4486	\$12.3951	\$20.1112	\$2.250	\$17.8612	
18	7%	93%	\$0.5023	\$0.467	\$0.083	\$1.05225	\$6.6636	\$12.8082	\$20.5240	\$2.325	\$18.1990	

*Less \$1.292m for 100 Early Retirement

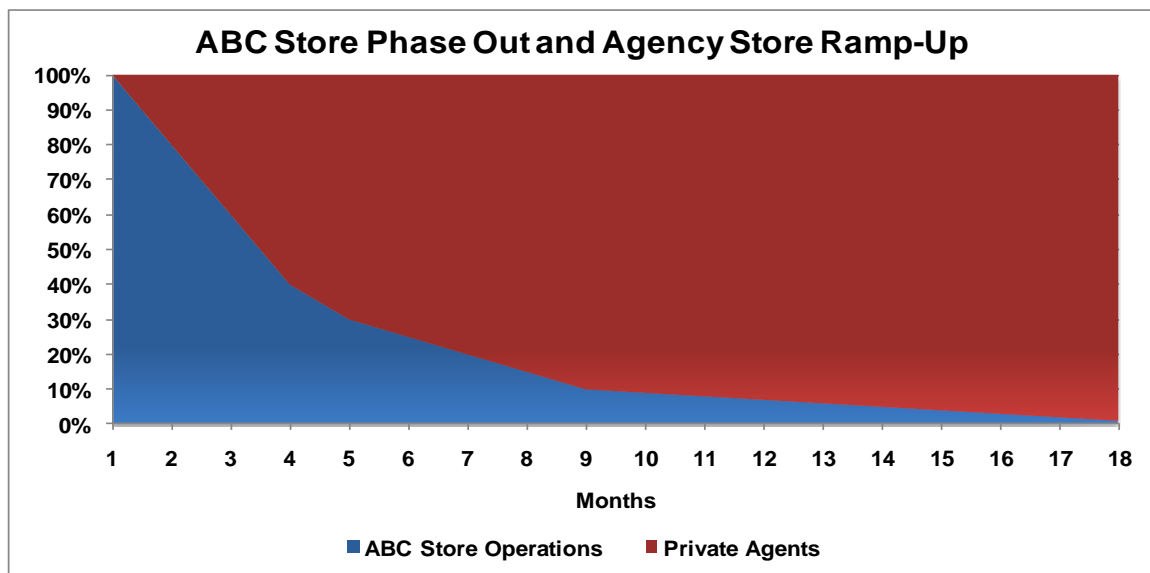
Impact of Agency Approach on State Operating Costs and Revenues

In many respects, the operational impact of the Agency Approach will be the same as that of the License option. Accordingly, most of the assumptions described in the preceding section would hold true under

this scenario. However, the timeframe for completing the agent application process and implementing the transition to agency stores is expected to be considerably shorter.

As depicted in the graphic above, the PFM team assumes the legislative and rulemaking timeframe. This conclusion is based on interviews with VABC executives.

However, once the auction of Agent franchises has occurred, the process of qualifying stores as agents should be considerably less involved than that of licensure. VABC officials indicate they believe the Agent approach does not require public comment, and while potential agents will have due process rights, since most are expected to be existing beer and wine retail licensees, the approval of them as agents of the State should be fairly straight-forward.



Accordingly, under this approach the team assumes the approval of agents and the transition to agency stores can be largely accomplished in 6 months, and the majority of VABC stores can be closed in about 8 months. The resulting fiscal impact is shown in the table below:

ABC Agency Transition Costs (Operating Costs + Severance Costs + Warehouse and Amin. + Agent Commission)											
Month #	ABC Store Operations	Private Agents	ABC Store Operations	7% Agent Commission	Warehouse Cost	ABC Admin. Cost	Operations Totals	WTA Cost	UI Cost *	Total Cost	SFY 2012 Cost
1	100%	0%	\$7.1750	\$0	\$0.467	\$0.083	\$7.7250	\$0	\$0	\$7.7250	
2	80%	20%	\$5.7400	\$0.804	\$0.467	\$0.083	\$6.2900	\$1.43303	\$2.75446	\$10.4775	
3	60%	40%	\$4.3050	\$1.608	\$0.467	\$0.083	\$4.8550	\$2.86605	\$5.50891	\$13.2300	
4	40%	60%	\$2.8700	\$2.412	\$0.467	\$0.083	\$3.4200	\$4.29908	\$8.26337	\$15.9824	
5	30%	70%	\$2.1525	\$2.813	\$0.467	\$0.083	\$2.7025	\$5.01559	\$9.64060	\$17.3587	
6	25%	75%	\$1.7938	\$3.014	\$0.467	\$0.083	\$2.3438	\$5.37385	\$10.32921	\$18.0468	
7	20%	80%	\$1.4350	\$3.215	\$0.467	\$0.083	\$1.9850	\$5.73210	\$11.01783	\$18.7349	
8	15%	85%	\$1.0763	\$3.416	\$0.467	\$0.083	\$1.6263	\$6.09036	\$11.70644	\$19.4231	
9	10%	90%	\$0.7175	\$3.617	\$0.467	\$0.083	\$1.2675	\$6.44862	\$12.39506	\$20.1112	
10	9%	91%	\$0.6458	\$3.658	\$0.467	\$0.083	\$1.1958	\$6.52027	\$12.53278	\$20.2488	
11	8%	92%	\$0.5740	\$3.698	\$0.467	\$0.083	\$1.1240	\$6.59192	\$12.67050	\$20.3864	
12	7%	93%	\$0.5023	\$3.738	\$0.467	\$0.083	\$1.0523	\$6.66357	\$12.80823	\$20.5240	\$35.59
13	6%	94%	\$0.4305	\$3.778	\$0.467	\$0.083	\$0.9805	\$6.73522	\$12.94595	\$20.6617	
14	5%	95%	\$0.3588	\$3.818	\$0.467	\$0.083	\$0.9088	\$6.80687	\$13.08367	\$20.7993	
15	4%	96%	\$0.2870	\$3.858	\$0.467	\$0.083	\$0.8370	\$6.87852	\$13.22139	\$20.9369	
16	3%	97%	\$0.2153	\$3.899	\$0.467	\$0.083	\$0.7653	\$6.95018	\$13.35912	\$21.0745	
17	2%	98%	\$0.1435	\$3.939	\$0.467	\$0.083	\$0.6935	\$7.02183	\$13.49684	\$21.2122	
18	1%	99%	\$0.0718	\$3.979	\$0.467	\$0.083	\$0.6218	\$7.09348	\$13.63456	\$21.3498	

*Less \$1.292m for 100 Early Retirement

Up-Front Payment

No up-front payments are expected from the Agent Approach. In the Agent states contacted, officials advised that all of the agent consideration was focused on the commission rate, and none on making an up-front payment.

However, privatizing the retail function of the Commonwealth's distilled liquor system under the License Approach can be expected to result in significant one-time revenue through the auction of retail licenses. The value of licenses to potential franchisees will be largely determined by the licensee's ability to generate profits from the retail sales of spirits. For the purposes of this analysis, PFM has assumed that virtually all of the liquor retailers will be existing stores that currently sell wine and beer.

Gross Profit

A licensee's level of retail markup (and thus gross profit), will vary, but based on the 15.1 percent mark-up afforded by the price-neutrality calculation discussed above, can be computed from the anticipated volume of sales.

Estimated Licensee Gross Profits	
Retail License Bid Estimate	Financial Results
Wholesale Price (Exclusive of Excise Tax)	\$52.17
Implied Retail Mark-up Percentage	15.1%
Volume of Distilled Spirits in Gallons	9,900,344
Implied Mark up per gallon	\$7.88
Gallons Per Case	2.377548
Implied Mark-up Per Case	\$18.73
Estimated cases sold	4,164,099
Implied Mark-up/Gross Profit:	\$77,991,646

Net Profit

The net benefit to retailers will depend on the incremental expense associated with the distilled spirits product line. We believe that established 'big box' retailers have existing infrastructure which can be easily modified for spirits sells (e.g. shelving, display spaces). Additionally, these type retailers will currently have all the administrative employees needed to manage spirit sales (e.g. bookkeepers, accountants, managers, etc.). Accordingly, while there will be some incremental payroll impact, administrative expense, and pro-rated allocation of overall store costs, the majority of gross mark-up is expected to translate into net profit.

After discussions with industry representatives, PFM has assumed that, for large-volume retailers, only 40 percent of the gross mark-up will be consumed by expense, and that 60 percent, on average, will fall to the store's bottom line as net profit. Moving along the spectrum of license types (i.e. from Level 1 to Level 4 licenses), smaller retailers will have to make additional investments in both areas in order to accommodate spirit sells. Therefore, these retailers will require additional mark-up to ensure profitability. PFM has assumed, for smaller-volume retailers, 75 percent of the gross mark-up will be consumed by expense, and only 25 percent, on average, will fall to the store's bottom line.

Payment Calculation Methodology: Profit Multiple

During the course of the analysis, the PFM Team interviewed a number of distilled beverage and retail industry officials who described their approach to valuation of retail license franchise as a multiple of



either the gross or net profit (descriptions varied). The multiples ranged from 2 to 6 times gross profit estimates based on a series of factors involving profitability, location, market conditions, demographics, store's overall marketing strategy, completion, etc. Due to the anecdotal nature of these discussions and the lack of on-point data to be used for confirmation, we developed a broad range of 2 to 6 times the expected net profit as an estimate of the franchise value of the Retail License.

In order to derive the appropriate profit figures for which to apply multiple estimates, PFM made a series of assumptions. We assumed:

- The 600 Level 1 and 150 Level 2 licenses would generate about 85 percent of the sales. This assumption is based on the current sales volume of similar size wine and beer retail licensees.
- The Level 1 and 2 stores would have relatively low marginal operating costs, and would generate net profit equal to 60 percent of the assumed gross retail mark-up of 15.1 percent.
- The Level 3 and 4 licensees will have smaller volumes and higher operating margins, resulting in smaller net profit (25 percent).
- All stores employed a gross mark-up that averages 15.1 percent.

Based on these assumptions, the chart below illustrates the potential business pro-forma for an "average" of the 750 Level 1 and 2 licensees, deemed to be high-volume stores, and an average of the one of remaining 250 low-volume stores.

Retail License Bid Estimate		High Volume Licensees	Low Volume Licensees
Wholesale Price (excl Excise Tax)		\$ 52.17	\$ 52.17
Implied Retail Mark-up Excl. Tax (Millions)		15.1%	15.1%
Volume in Gallons (Millions)		9,900,344	9,900,344
Implied Mark up per gallon		\$ 7.88	\$ 7.88
Gallons Per Case		2.377548	2.377548
Implied Mark-up Per Case		\$ 18.73	\$ 18.73
Prototype Store			
Number of Stores		750	250
Estimated cases sold		4,719	2,498
Implied Mark-up (Millions)		\$ 88,390.53	\$ 46,794.99
Cost of Operation:			
Payroll	Includes all benefits	\$ 20,000.00	\$ 22,000.00
Space (Lease, part-store allocation, etc)	Includes util., ins., p/r, taxes, etc.	5,500.00	5,000.00
Loss Allowance		2,500.00	1,000.00
Overhead	Includes advertising & admin	1,000.00	1,000.00
Other Taxes		4,000.00	2,000.00
Other		1,000.00	1,000.00
Total Operating Costs		\$ 34,000.00	\$ 32,000.00
Percent of Gross Profit		60.00%	25.00%
Implied Net Profit		\$ 53,034.32	\$ 11,698.75



Based on discussions with commercial banking officials and published information regarding the business financing of up-front franchise costs, PFM assumed that businesses would be willing to invest half of their net profit over some period of time in the cost of a franchise. By assuming this amount as available to be amortized, we derived the net present value of up-front payments over five, ten, fifteen, and twenty year amortization terms.

Resulting Franchise Leverage (High Volume):		Annual	Total Payments	Net Present Value	x 750 Licenses
@ years:	5	\$ 26,517	\$ 132,586	\$ 122,765	\$ 92,073,471
@ years:	10	\$ 26,517	\$ 265,172	\$ 245,529	\$ 184,146,941
@ years:	15	\$ 26,517	\$ 397,757	\$ 368,294	\$ 276,220,412
@ years:	20	\$ 26,517	\$ 530,343	\$ 491,059	\$ 368,293,882
Resulting Franchise Leverage (Low Volume):		Annual	Total Payments	Net Present Value	x 250 Licenses
@ years:	5	\$ 5,849	\$ 29,247	\$ 27,080	\$ 6,770,108
@ years:	10	\$ 5,849	\$ 58,494	\$ 54,161	\$ 13,540,216
@ years:	15	\$ 5,849	\$ 87,741	\$ 81,241	\$ 20,310,324
@ years:	20	\$ 5,849	\$ 116,987	\$ 108,322	\$ 27,080,433
Total Estimated Valuation @ 5 years \$ 98,843,579 Total Estimated Valuation @ 10 years \$ 197,687,157 Total Estimated Valuation @ 15 years \$ 296,530,736 Total Estimated Valuation @ 20 years \$ 395,374,315					

Using this approach to financing capacity yields a wide range of results; primarily dependent upon the amortization period assumed. To draw some conclusions from this approach, PFM assumed that while the same profit metrics were used for all high and low volume stores, there will certainly be volume and profit disparity within those large groupings. Accordingly, in assessing the potential for licensees to use their financing capacity to amortize an up-front payment, PFM assumed that the largest volume retailers will have the most to gain and would be willing to finance the payment for the longest time period in order to generate a competitive up-front payment, and the smallest, lowest volume outlets would be only be able to amortize a payment over the shortest period. Using this approach, PFM assumed that half of the high-volume retailers would use the 20 year period, 200 would use 15 years, 175 high volume and 150 low-volume stores would use 10 years, and the 100 smallest would use 5 years. The results of these assumptions are shown in the chart below:

Largest 375 High-Volume Retailers @ 20 years	\$	184,146,941
Next Largest 200 High-Volume Retailers @ 15 years	\$	73,658,776
Smallest 175 High-Volume Retailers @ 10 years	\$	42,967,620
Largest 150 Low-Volume Retailers @ 10 years	\$	8,124,130
Smallest 100 Low-Volume Retailers @ 5 years	\$	2,708,043
TOTAL	\$	311,605,510

For comparison, PFM examined the same profitability assumptions to gain a sense of what the value of up-front payments would be using the “rule of thumb” methodology suggested by the distilled spirits industry, of a simple multiple of profit. Consistent with our business financing approach described above, we used an incrementally decreasing set of multiples to develop an estimate. The charts below describe the calculations, using the same five licensee categories described above:

High-Volume Gross	\$ 88,390.53
Stores	\$ 750
Total	\$ 66,292,898.79
Low-Volume Gross	\$ 46,794.99
Stores	250
Total	\$ 11,698,746.84
Total Gross	\$ 77,991,645.63

High-Volume Gross	\$ 88,390.53
Stores	375
Total	\$ 33,146,449
Multiple	6.0
Payment	\$ 198,878,696

High-Volume Gross	\$ 88,390.53
Stores	200
Total	\$ 17,678,106
Multiple	4.5
Payment	\$ 79,551,479

High-Volume Gross	\$ 88,390.53
Stores	175
Total	\$ 15,468,343
Multiple	3.0
Payment	\$ 46,405,029

Low-Volume Gross	\$ 46,794.99
Stores	150
Total	\$ 7,019,248
Multiple	3.0
Payment	\$ 21,057,744

Low-Volume Gross	\$ 46,794.99
Stores	100
Total	\$ 4,679,499
Multiple	1.5
Payment	\$ 7,019,248

When taken together, the various multiples for the five business segments yield a total of over \$352.9 million. The chart below compares the outcomes of the financing capacity and profit multiples approaches.

Licensee Segment	Gross Profit		Net Profit Amortization	
	Multiple	Amount (Millions)	Years	Amount (Millions)
Largest 375 High-Volume Retailers	6.0	\$198.88	20	\$184.15
Next Largest 200 High-Volume Retailers	4.5	\$79.55	15	\$73.66
Smallest 175 High-Volume Retailers	3.0	\$46.41	10	\$42.97
Largest 150 Low-Volume Retailers	3.0	\$21.06	10	\$8.12
Smallest 100 Low-Volume Retailers	1.5	\$7.02	5	\$2.71
Total:		\$352.91		\$311.61

While both of these approaches are essentially anecdotal, the fact that they produced similar results provides relative confidence that the auction of 1,000 retail licenses should produce something in the range of \$300 million in up-front payments.

However, because there are a number of variables involved in this estimate, a significant risk-range exists around the license initial payment estimate. To illustrate some of the variables at work in this analysis, the table below takes the recommended spread of amortizations and applies different assumptions about the retail mark-up that retailers might assume. This chart demonstrates the fact that profit estimates are a powerful variable and different assumptions yield significantly different results:

	Implied Retail Mark-up Excluding Tax			
	5.0%	10.0%	15.1%	20.0%
Largest 375 High-Volume Retailers @ 20 years	\$ 60,975,808	\$ 121,951,617	\$ 184,146,941	\$ 243,903,233
Next Largest 200 High-Volume Retailers @ 15 years	\$ 24,390,323	\$ 48,780,647	\$ 73,658,776	\$ 97,561,293
Smallest 175 High-Volume Retailers @ 10 years	\$ 14,227,689	\$ 28,455,377	\$ 42,967,620	\$ 56,910,754
Largest 150 Low-Volume Retailers @ 10 years	\$ 2,690,109	\$ 5,380,218	\$ 8,124,130	\$ 10,760,437
Smallest 100 Low-Volume Retailers @ 5 years	\$ 896,703	\$ 1,793,406	\$ 2,708,043	\$ 3,586,812
TOTAL	\$ 103,180,632	\$ 206,361,265	\$ 311,605,510	\$ 412,722,530

Moreover, a number of the characteristics of the Virginia license strategy will have significant impacts on bids that, at this juncture, cannot be quantified. These include:

- The Virginia licenses would be issued in perpetuity;
- The licenses become business property and can be sold along with the business; and
- Since VABC will control the wholesale price, all licensees will pay the same wholesale price, and it will be difficult for high-volume retailers to create lower-cost private-label brands.

The first two factors above should add significantly to the value of Virginia liquor licenses, while the third will tend to depress the amount of the bids.

Given all of the intangibles involved, the limited experience of other states, and the subjective nature of any bidding process, we caution that there is a significant range of risk of possible outcomes surrounding this figure. While there is not sufficient data to support a statistical calculation of a risk coefficient, PFM believes it is reasonable to plan on a \$100 million variance – either high or low – from the \$300 million estimate.

Budget Neutrality

A critical element of the privatization concept is the ability to hold the State's current net fiscal benefit constant going forward. Accordingly, an essential step in measuring any approach to privatization is to measure its impact against an objective standard for fiscal neutrality. In this section, we discuss the various elements of revenue and expense that are driven by the present system of alcoholic beverage control, taxation and sale.

The charts below describe the total revenue, from various sources, including taxes, fees, and the gross sales of VABC. Taken together, these receipts constitute the total source of monies from all funds, excluding Federal, generated by, and available to the Commonwealth for VABC operations. Additionally, the charts detail the expenses incurred in the operation of VABC. Taken together, these items constitute the total disbursements from all funds, excluding Federal, in support of VABC.

Key Assumptions:

Gross Sales

The current VABC sales volume is shown in the chart below:

State Store Sales	
Category	Gallons
Distilled Spirits	9,428,899
Virginia Wine	28,506
Vermouth	38,697
Alcohol	110
Non-Alcoholic Mixers	322,444
TOTAL	9,818,657

*Note: 9,818,657 used as rounded to the nearest whole number.

Under the Agent Approach, VABC sales are assumed to remain constant at current levels, less the sale of approximately 390,000 gallons of Virginia wine, vermouth and mixers, which we assume will be absorbed into the existing wine distribution and sales volume. Accordingly, no change in wine sales is calculated for tax purposes, but the VABC sales volume is adjusted to reflect only the 2 percent increase in distilled spirits volume, yielding 9.617 million gallons.

Under the License Approach, sales in FY 2012 will be a mix of retail sales from remaining VABC stores, and wholesale sales to new retail licensees. Additionally, as described in the chapters above, distilled spirits sales are projected to rise by approximately 5 percent to 9.900 million gallons. The chart below details the expected mix of wholesale and retail sales:

ABC Gross Sales 2012 License Approach \$ in Millions								
Mnth	ABC Store	Private	ABC Store	ABC Store	ABC Store Sals	ABC Store	ABC Total	12 Month
#	Operations	Licenses	Retail Sales (NoT)	DS Excise Tax	W/ Excise Tax	Wholesale Sales	Gross Sales (NoT)	Total
1	100%	0%	\$47.66	\$9.41	\$57.07	\$0.00	\$47.66	
2	90%	10%	\$42.90	\$8.47	\$51.37	\$4.30	\$47.20	
3	80%	20%	\$38.13	\$7.53	\$45.66	\$8.61	\$46.74	
4	70%	30%	\$33.36	\$6.59	\$39.95	\$12.91	\$46.28	
5	60%	40%	\$28.60	\$5.65	\$34.24	\$17.22	\$45.81	
6	50%	50%	\$23.83	\$4.71	\$28.54	\$21.52	\$45.35	
7	40%	55%	\$19.06	\$3.76	\$22.83	\$23.67	\$42.74	
8	37%	60%	\$17.63	\$3.48	\$21.12	\$25.83	\$43.46	
9	35%	64%	\$16.68	\$3.29	\$19.98	\$27.55	\$44.23	
10	34%	67%	\$16.20	\$3.20	\$19.40	\$28.84	\$45.04	
11	31%	69%	\$14.78	\$2.92	\$17.69	\$29.70	\$44.47	
12	28%	72%	\$13.35	\$2.64	\$15.98	\$30.82	\$44.16	\$543.14
13	20%	80%	\$9.53	\$1.88	\$11.41	\$34.43	\$43.97	
14	20%	80%	\$9.53	\$1.88	\$11.41	\$34.43	\$43.97	
15	16%	83%	\$7.63	\$1.51	\$9.13	\$35.72	\$43.35	
16	11%	85%	\$5.24	\$1.04	\$6.28	\$36.59	\$41.83	
17	9%	90%	\$4.29	\$0.85	\$5.14	\$38.74	\$43.03	
18	7%	93%	\$3.34	\$0.66	\$4.00	\$40.03	\$43.37	

*DS, Wine, Other @ 2010 Volume

**DS Only at 5% Volume Growth

One-Time Expenses Excluded

As discussed in the Cost of Conversion Chapter, there are a number of employee severance costs that are related to store closures. The costs of Unemployment Insurance and Workforce Transition Act (WTA) are excluded from the budget neutrality calculations below due to their one-time nature. Under the License Approach, these costs could be offset by a portion of the up-front fees for licenses. Since no up-front monies are assumed for the Agent Approach, these costs would represent a one-time cost to the Commonwealth.

Additionally, VABC has purchased and is deploying a new automated Point of Sale (POS) cash register and sales/inventory data management system, which will presumably be liquidated. While, on an accrual basis, this action will result in a write-off of this beneficial asset of approximately \$8 million, on a cash basis (since the system has been paid for, and its liquidated value is uncertain), it is assumed not to be a budget expense.

Tax Benefits

PFM assumes that no net new employment will be created as a result of either approach. While approximately 500 employees will be separated from State service with the closure of 332 stores, we assume that, for the most part, an equal number of new jobs will be created in the 1,000 new licensees. Accordingly, new taxable personal income is anticipated from employment. However, as detailed in the Up-Front License Chapter, we believe additional net business income will be created under both approaches. The tables below reflect the calculation of small amount of additional tax receipts that can be expected. It should be noted that, since not all businesses who are licensees or agents will have overall taxable net income, a significant reduction of liability has been taken to account for that factor.

It could also be argued that there will be additional tax revenue generated by additional private sector activity associated with private retail sales of distilled spirits. Increased advertising, promotions and other activity will result in additional revenues and profits in these related industries, which will likely mean greater taxable income in the Commonwealth. The extent of this 'spin-off' economic effect is unclear, particularly given uncertainty around timing of some of this activity, so is not included in the current model for budget neutrality.

Additionally, according to the Commonwealth's Department of Taxation, BPOL receipts for counties and local jurisdictions under the license and agent approaches would increase above the current level by approximately \$1.1 million dollars; \$1.14 million under the license approach and \$1.12 million under the agent approach. This revenue does not impact the Commonwealth or assessments of budget neutrality and as such is not reflected in the modeled calculations.

Tax Calculations	
Total Net Profit	
License	
High-Volume	\$39,775,739
Low-Volume	\$2,924,687
Total	\$42,700,426
Agent	
Total Commission @ 7%	\$47,926,556
50% Net Profit	\$23,963,278

Tax Calculations - License Approach			
Item	Totals	Corp. Tax	P.I.T.
Total Net Profit:	\$42,700,426		
Corp/PIT Split (@ 85/15)		\$36,295,362	\$6,405,064
Corp Tax at 6.0%		\$2,177,722	
PIT Tax @ 4.11%			\$263,248
Total Business Tax Liability:	\$2,440,970		
Profitability Allowance (@ 75% discount)	\$1,830,727		
Estimated Tax Benefit:	\$610,242		

Tax Calculations - Agent Approach			
Item	Totals	Corp. Tax	P.I.T.
Total Net Profit:	\$23,963,278		
Corp/PIT Split (@ 85/15)		\$20,368,786	\$3,594,492
Corp Tax at 6.0%		\$1,222,127	
PIT Tax @ 4.11%			\$147,734
Total Business Tax Liability:	\$1,369,861		
Profitability Allowance (@ 75% discount)	\$1,027,396		
Estimated Tax Benefit:	\$342,465		

License Approach

Under the License Approach, store closure will take longer but sales growth will occur. As depicted in the table on page 62, this approach is net positive by approximately \$12.81 million.

Agency Approach

Under the Agency Approach, VABC will see a faster store closure and retain more of the gross mark-up, less the cost of agency commissions. As depicted in the table on page 63, this approach is net positive by approximately \$37.16 million.

FY 2011 Budget Neutrality Benchmark

After consultation with analysts at VABC as well as the Governor's Department of Planning and Budget, the agencies have agreed on a series of revenue and spending estimates for the current Fiscal Year that result in a net benefit to the State Budget of \$324.64 million. It is that number to which all the fiscal estimates for 2012 privatization are compared. The FY 2010 actuals for each item are provided for reference.

The charts on the following pages identify and total all of the cash receipts generated by the sale of distilled spirits in Virginia, including the gross sales by VABC, and detail all of the cash disbursements that must be supported by those monies. By deducting costs from receipts, the net benefit for each scenario is determined and then compared to the 2011 benchmark to determine the gain or loss from the initiative.

This analysis included the approximately \$16 million value of VABC retail properties being sold, but excluded an estimated \$10-\$30 million in employee severance costs since the data were not available to precisely forecast how much of this expense would ultimately be incurred. Employee severance costs will vary based upon a number of variables that cannot be precisely calculated such as how many employees will separate via early retirement, whether or not the pension system will absorb such costs, the number of employees who will be eligible for re-employment with the Commonwealth and not incur WTA or unemployment expenses, and those employees who may be hired by private licensees or agents. While the actual severance costs cannot be calculated, PFM believes the actual costs of severance will fall closer to the mid-range or a bit below the mid-range (due to attrition, early separations, etc.) than toward the higher-end number of \$30 million.

The charts detail the impact for the License and Agent approach for both the FY 2012 transition year, and on an ongoing annual amount. Assuming the phase-in described in the Cost of Conversion chapter, most of the transition will be completed by June 30, 2012. However, there will be some residual transition impact in 2013. Accordingly, while most of the factors in the ongoing analysis will be in place, some minor variance can be expected.



SFY 2012 Budget Neutrality License Approach (\$ in millions)				
	ACTUAL FY2010	BUDGET FY2011	PRIVATIZATION PLAN	ASSUMPTIONS
Sources:				
General Fund Revenue:				
Spirits Excise Tax	\$111.30	\$113.00	\$103.30	Assumes 9.900M gals @ 20% ExT on Wholesale
Wine Excise Tax	\$20.30	\$20.00	\$20.00	Assumes no change
Malt Beverage Tax	\$43.50	\$43.40	\$43.40	Assumes no change
Retail Sales Tax	\$26.90	\$25.60	\$28.19	Assumes 9.900M gals.
Business Tax	\$0.00	\$0.00	\$0.44	Assumes 73% Phase in
Total GF:	\$202.00	\$202.00	\$195.33	
Non-General Fund Revenue:				
Wine Excise Tax for BH/DS (Part 3)	\$9.90	\$9.10	\$9.10	Assumes no change
License Tax (NGF)	\$11.10	\$10.70	\$10.70	Assumes no change
New Spirit Retail Licenses	\$0.00	\$0.00	\$1.79	1,000 @ \$2,500/yr. phased in
Miscellaneous Revenue	\$6.20	\$6.20	\$6.20	Assumes no change
Total NGF:	\$27.20	\$26.00	\$27.79	
ABC Gross Sales:	\$564.10	\$571.94	\$543.14	Assumes Phase-in
Total All Funds Sources:	\$793.30	\$799.94	\$766.26	
Uses:				
ABC Operations:				
Existing Enforcement Costs	\$13.90	\$14.00	\$14.00	Excludes Seized Assets
Technology-VITA	\$14.70	\$17.60	\$13.00	Assumed 70% Store IT Phased out.
Board and Hearings Costs	\$3.80	\$3.80	\$3.80	Assumes no change
Office Space Costs	\$1.70	\$1.70	\$1.70	Assumes no change
Other Miscellaneous Expenses	\$8.50	\$11.50	\$11.50	Appraisals, Litigation, Advertising
Store Operations	\$83.90	\$85.30	\$54.20	Store Phase out costs Plus Warehouse and Admin
ABC Efficiencies	-\$1.60	-\$1.60	\$0.00	Assumes no store efficiencies during transition
Warehouse Operations/Transportation	\$9.90	\$9.90	\$9.90	Assumes no change
Operations Total:	\$134.80	\$142.20	\$108.10	
Cost of Goods:	\$329.60	\$333.10	\$335.79	
Cost of Conversion:				
Administrative Costs	\$0.00	\$0.00	\$0.00	Extra Hearings, Investigations. Logistics are one-time
Liquidate ABC Owned Stores	\$0.00	\$0.00	-\$16.92	Net Sale of Real Estate
ABC Rental			\$0.15	Rental Space in Annondale and Hampton for Enforcement
Severance/Closure	\$0.00	\$0.00	\$0.00	WTA, UI, Etc. are one-time
Warehouse and Distribution	\$0.00	\$0.00	\$0.00	Are shown in Store Operations during Transition
Subtotal	\$329.60	\$333.10	\$319.02	
Net Revenue From Operations:	\$234.50	\$238.84	\$224.12	
Additional 22 Officers	\$0.00	\$0.00	\$1.70	Per DPB assumed to be full-year
Total Other Costs	\$0.00	\$0.00	\$1.70	
Total All Funds Uses:	\$464.40	\$475.30	\$428.82	
Net Surplus (Sources-Uses):	\$328.90	\$324.64	\$337.44	\$12.81
One-Time Costs:				
WTA and UI costs	\$10.00 to \$30.00			
VABC 1-time Admin Workload	\$ 1.00			
Liquidation of Fixtures	\$ (1.00)			
Redemption of Gift Cards	\$ -	Money is escrowed		
POS Write-off	\$ -	Not a cash transaction		



SFY 2012 Budget Neutrality Agent Approach (\$ in millions)				
	ACTUAL FY2010	BUDGET FY2011	PRIVATIZATION PLAN	ASSUMPTIONS
Sources:				
General Fund Revenue:				
Spirits Excise Tax	\$111.30	\$113.00	\$114.11	Assumes 9.617M gals
Wine Excise Tax	\$20.30	\$20.00	\$20.00	Assumes no change
Malt Beverage Tax	\$43.50	\$43.40	\$43.40	Assumes no change
Retail Sales Tax	\$26.90	\$25.60	\$27.39	Assumes 9.617M gals
Business Tax	\$0.00	\$0.00	\$0.32	Assumes 93% phase in
Total GF:	\$202.00	\$202.00	\$205.22	
Non-General Fund Revenue:				
Wine Excise Tax for BH/DS (Part 3)	\$9.90	\$9.10	\$9.10	Assumes no change
License Tax (NGF)	\$11.10	\$10.70	\$10.70	Assumes no change
Miscellaneous Revenue	\$6.20	\$6.20	\$6.20	Assumes no change
Total NGF:	\$27.20	\$26.00	\$26.00	
ABC Gross Sales:	\$564.10	\$571.94	\$571.02	
Total All Funds Sources:	\$793.30	\$799.94	\$802.24	
Uses:				
ABC Operations:				
Existing Enforcement Costs	\$13.90	\$14.00	\$14.00	Excludes seized assets
Technology-VITA	\$14.70	\$17.60	\$13.00	Assumed 70% Store IT Phased out.
Board and Hearings Costs	\$3.80	\$3.80	\$3.80	Assumes no change
Office Space Costs	\$1.70	\$1.70	\$1.70	Assumes no change
Other Miscellaneous Expenses	\$8.50	\$11.50	\$11.50	Appraisals, Litigation, Advertising
Store Operations	\$83.90	\$85.30	\$35.59	Store Phase out costs Plus Warehouse and Admin
Agent Commissions	\$0.00	\$0.00	\$31.99	Phase-in
ABC Efficiencies	-\$1.60	-\$1.60	\$0.00	Assumes no change
Warehouse Operations/Transportation	\$9.90	\$9.90	\$9.90	Assumes no change
Operations Total:	\$134.80	\$142.20	\$121.48	
Cost of Goods:	\$329.60	\$333.10	\$334.03	
Cost of Conversion:				
Administrative Costs	\$0.00	\$0.00	\$0.00	Extra Hearings, Investigations. Logistics are one-time
Liquidate ABC Owned Stores	\$0.00	\$0.00	-\$16.92	Net Sale of Real Estate
ABC Rental			\$0.15	Rental Space in Annondale and Hampton for Enforcement
Severance/Closure	\$0.00	\$0.00	\$0.00	WTA, UI, Etc. are one-time
Warehouse/Transportation	\$0.00	\$0.00	\$0.00	Are shown in Store Operations during Transition
Subtotal	\$464.40	\$475.30	\$317.25	
Net Revenue From Operations:	\$99.70	\$96.64	\$253.77	
Additional 22 Officers	\$0.00	\$0.00	\$1.70	Per DPB assumed to be full-year
Total Other Costs	\$0.00	\$0.00	\$1.70	
Total All Funds Uses:	\$464.40	\$475.30	\$440.43	
Net Surplus (Sources-Uses):	\$328.90	\$324.64	\$361.80	\$37.16
One-Time Costs:				
WTA and UI costs	\$10.00 to \$30.00			
VABC 1-time Admin Workload	\$ 1.00			
Liquidation of Fixtures	\$ (1.00)			
Redemption of Gift Cards	\$ -			Money is escrowed
POS Write-off	\$ -			Not a cash transaction

It is important to note that under both the license and agent approaches all assumed growth is tied to an increase in convenience to consumers. The assumed volume growth for the License Approach is 5 percent and assumed growth for Agent Approach is 2 percent. The two approaches also have different phase-in schedules. As a result, each approach has two different sets of calculations necessary to arrive at the transition year number: 1) the calculation of the VABC store sales during phase-out with no assumed increase in volume; and 2) the calculation of the sales from license or agent stores coming online, with the associated volume increase. Under either approach, the phase-out of VABC stores and the phase-in of license or agent stores do not net to zero.

During the transition year, both approaches are roughly fiscally neutral, with the License Approach slightly positive due to the slower assumed store closure schedule (discussed in the Cost of Closure Chapter), which allows it to reap both retail license fees and retain more of the full retail mark-up during the year. Newly licensed entities would also be charged a lower excise tax (50 percent), resulting in a tax cut and receipt of slightly lower revenues by the Commonwealth. The overlap of agent commissions and store closures drive a more positive result for the Agent Approach during the transition year as the Commonwealth acts both as a wholesaler and retailer until all agents are operational.

It should be noted that, given the numerous operational assumptions built into the transition plans for both approaches the actual results may vary from these estimates. Accordingly, we assume that, within a relative range of risk, both scenarios are fiscally neutral in the transition year. It should also be noted that these charts hold all factors constant unless there is an impact from privatization. Accordingly, normal consumption growth, inflation, cost changes in distilled goods, government employees' wages and benefits and any law changes in revenue statutes are not reflected as they would occur in any case. As such, while the future numbers may very well change, the budget neutrality calculations should be a reliable measure of the relative changes that would occur under privatization.

Because of the numerous variables involved in the transition year, especially the timing of the phase-out of VABC Stores, the Budget Neutrality calculations for 2012 are subject to considerable risk of variance. Accordingly, PFM recommends that decision-makers focus on the ongoing fiscal impact in making judgments about the privatization options reviewed.



Ongoing Budget Neutrality License Approach (\$ in millions)				
	ACTUAL	BUDGET	PRIVATIZATION	
	FY2010	FY2011	PLAN	ASSUMPTIONS
Sources:				
General Fund Revenue:				
Spirits Excise Tax	\$111.30	\$113.00	\$103.30	Assumes 9.900M gals @ 20% ExT on Wholesale
Wine Excise Tax	\$20.30	\$20.00	\$20.00	Assumes no change
Malt Beverage Tax	\$43.50	\$43.40	\$43.40	Assumes no change
Retail Sales Tax	\$26.90	\$25.60	\$28.19	Assumes 9.900M gals.
Business Tax	\$0.00	\$0.00	\$0.61	Full Value
Total GF:	\$202.00	\$202.00	\$195.50	
Non-General Fund Revenue:				
Wine Excise Tax for BH/DS (Part 3)	\$9.90	\$9.10	\$9.10	Assumes no change
License Tax (NGF)	\$11.10	\$10.70	\$10.70	Assumes no change
New Spirit Retail Licenses	\$0.00	\$0.00	\$2.50	All 1,000 @ \$2,500/yr.
Miscellaneous Revenue	\$6.20	\$6.20	\$6.20	Assumes no change
Total NGF:	\$27.20	\$26.00	\$28.50	
ABC Gross Sales:	\$564.10	\$571.94	\$516.50	Assumes full wholesale of 9.900M gallons
Total All Funds Sources:	\$793.30	\$799.94	\$740.50	
Uses:				
ABC Operations:				
Existing Enforcement Costs	\$13.90	\$14.00	\$14.00	Excludes Seized Assets
Technology-VITA	\$14.70	\$17.60	\$10.00	Store IT Phased out.
Board and Hearings Costs	\$3.80	\$3.80	\$3.80	Assumes no change
Office Space Costs	\$1.70	\$1.70	\$1.70	Assumes no change
Other Miscellaneous Expenses	\$8.50	\$11.50	\$11.50	Appraisals, Litigation, Advertising
Store Operations	\$83.90	\$85.30	\$0.00	Stores closed
ABC Efficiencies	-\$1.60	-\$1.60	\$0.00	Stores closed
Warehouse Operations/Transportation	\$9.90	\$9.90	\$9.90	Assumes no change
Sub-Total	\$134.80	\$142.20	\$50.90	
Cost of Goods	\$329.60	\$333.10	\$344.33	
Cost of Conversion:				
Administrative Costs	\$0.00	\$0.00	\$0.00	Stores closed
Liquidate ABC Owned Stores	\$0.00	\$0.00	\$0.00	Stores closed
ABC Rental			\$0.15	Rental Space in Annondale and Hampton for Enforcement
Severance/Closure	\$0.00	\$0.00	\$0.00	Stores closed
Warehouse and Distribution	\$0.00	\$0.00	\$5.60	Warehouse Extra Shifts and Trucks
Subtotal	\$329.60	\$333.10	\$350.08	
Net Revenue From Operations:	\$99.70	\$96.64	\$115.52	
Additional 22 Officers	\$0.00	\$0.00	\$1.70	Per DPB assumed to be full-year
Total Other Costs	\$0.00	\$0.00	\$1.70	
Total All Funds Uses:	\$464.40	\$475.30	\$402.68	
Net Surplus (Sources-Uses):	\$328.90	\$324.64	\$337.82	\$13.18



Ongoing Budget Neutrality Agent Approach (\$ in millions)				
	ACTUAL FY2010	BUDGET FY2011	PRIVATIZATION PLAN	ASSUMPTIONS
Sources:				
General Fund Revenue:				
Spirits Excise Tax	\$111.30	\$113.00	\$114.11	Assumes 9.617M gals
Wine Excise Tax	\$20.30	\$20.00	\$20.00	Assumes no change
Malt Beverage Tax	\$43.50	\$43.40	\$43.40	Assumes no change
Retail Sales Tax	\$26.90	\$25.60	\$27.39	Assumes 9.617M gals
Business Tax	\$0.00	\$0.00	\$0.34	Full Value
Total GF:	\$202.00	\$202.00	\$205.24	
Non-General Fund Revenue:				
Wine Excise Tax for BH/DS (Part 3)	\$9.90	\$9.10	\$9.10	Assumes no change
License Tax (NGF)	\$11.10	\$10.70	\$10.70	Assumes no change
Miscellaneous Revenue	\$6.20	\$6.20	\$6.20	Assumes no change
Total NGF:	\$27.20	\$26.00	\$26.00	
ABC Gross Sales:	\$564.10	\$571.94	\$574.18	Assumes phases volume and loss of wine/mixers
Total All Funds Sources:	\$793.30	\$799.94	\$805.42	
Uses:				
ABC Operations:				
Existing Enforcement Costs	\$13.90	\$14.00	\$14.00	Excludes seized assets
Technology-VITA	\$14.70	\$17.60	\$10.00	Store IT Phased out.
Board and Hearings Costs	\$3.80	\$3.80	\$3.80	Assumes no change
Office Space Costs	\$1.70	\$1.70	\$1.70	Assumes no change
Other Miscellaneous Expenses	\$8.50	\$11.50	\$11.50	Appraisals, Litigation, Advertising
Store Operations	\$83.90	\$85.30	\$0.00	Stores closed
Agent Commissions	\$0.00	\$0.00	\$48.23	Assumed 7% on 9.617M gals.
ABC Efficiencies	-\$1.60	-\$1.60	\$0.00	Stores closed
Warehouse Operations/Transportation	\$9.90	\$9.90	\$9.90	Assumes no change
Operations Total:	\$134.80	\$142.20	\$99.13	
Cost of Goods:	\$329.60	\$333.10	\$334.50	
Cost of Conversion:				
Administrative Costs	\$0.00	\$0.00	\$0.00	Hearings, Investigations, Logistics
Liquidate ABC Owned Stores	\$0.00	\$0.00	\$0.00	Net Sale of Real Estate
ABC Rental			\$0.15	Rental Space in Annondale and Hampton for Enforcement
Severance/Closure	\$0.00	\$0.00	\$0.00	WTA, UI, Etc.
Warehouse/Transportation	\$0.00	\$0.00	\$5.60	Warehouse Extra Shifts and Trucks
Subtotal	\$464.40	\$475.30	\$340.25	
Net Revenue From Operations:	\$99.70	\$96.64	\$233.94	
Additional 22 Officers	\$0.00	\$0.00	\$1.70	Per DPB assumed to be full-year
Total Other Costs	\$0.00	\$0.00	\$1.70	
Total All Funds Uses:	\$464.40	\$475.30	\$441.08	
Net Surplus (Sources-Uses):	\$328.90	\$324.64	\$364.34	\$39.71

Overall Economic Model

It goes without saying that it is extremely difficult to model a dramatic change in the method for delivering services for an industry of this size and scope. It becomes even more difficult to do when it involves multiple public and private sector decisions that are, in many respects, beyond the control of any single entity or individual. There are a plethora of possible scenarios in nearly every aspect of the undertaking.

Recognizing this enormous level of uncertainty, we have sought to develop a reasonable set of assumptions around a handful of key 'guiding principles.' Policymakers may wish to modify these principles to serve other goals. Where possible, we have identified some of these options and opportunities in the preceding and succeeding discussion. As choices are made, the numbers within the model can also be changed to reflect different choices.

The key guiding principles are:

1. The number, type and location of private retail stores as detailed in Governor McDonnell's original proposal to privatize both the wholesale and retail system.
2. Achieving Budget Neutrality for the Commonwealth – maintaining the current relationship between ongoing revenues and expenditures from the VABC operations. It must be noted that Budget Neutrality does not take into consideration one-time revenues associated with the auctioning of franchises or one-time costs associated with the closure of the current VABC stores.
3. Establishing a wholesale mark-up and a minimum franchise bid level that will allow sufficient opportunity for private retailers to earn a sufficient return on their investment.
4. Establishing policies that balance the need for VABC to continue to operate the wholesale operation and regulate private sellers and provide retailers the flexibility they need to best serve their customers.
5. Creating a new funding source for transportation infrastructure. This could be a one-time un-front revenue source or a longer-term continuing revenue stream.

Consistent with these principles, the following are the key assumptions that drive calculations of revenue and expenditures:

- To achieve Budget Neutrality, a State mark-up was reduced to 50 percent for purposes of calculations – the current mark-up is almost 70 percent.
- Given projected sales levels and assumed private return on investment, retail mark-up is projected, on average, to be 15.10 percent. It should be noted that this will vary by type of business and location, with some larger retailers operating on a 'high volume lower mark-up' business model and smaller retailers requiring larger mark-ups to be able to generate a reasonable return on investment. This will also vary by product and brand.
- Based projected levels of profitability and standard business formulas for amortizing initial start-up costs for doing business (in this case, largely the franchise fee), minimum franchise fees are projected to be approximately \$300 million but with significant risk of possible negative variance. Because of the large number of exogenous variables and intangibles and the length of time permitted for this study, this range is large. That said, it is not clear that additional time for study would yield a more concrete conclusion.

- On average, prices are unlikely to change significantly, at least in the short run, as retailers are likely to seek to attract and retain new customers; larger retailers are also likely to operate on lower margins than current state operations. Competition among retailers, particularly in high-volume areas, should also act as a check on price increases.
- Primary growth in sales will be based on repatriation, particularly in Northern Virginia, where high income levels and population density suggest per capita consumption levels that approximate the nation as a whole. The degree of that movement will depend on the degree to which consumers change current behavior in response to greater convenience and competition, as well as the degree to which prices change with full retail privatization.

Recommendations

Recommendations

Based on the preceding analysis, we make the following broad recommendations; earlier discussion and analysis should also be relied upon for guidance on more specific issues:

1. The choice between private retail stores or Agency stores is a fundamental starting point in the discussion and analysis. As noted earlier in the report, both systems are workable and in place in multiple states – in fact, there are four states that have a combination of private retail stores and Agency stores. While both systems have their advantages, our preference is for a system using private retail stores. We believe that system is best suited for making business decisions that best serve the needs of customers and provides the greatest opportunity to raise both one-time revenues through franchise fees and ongoing revenues through market-driven decision making.
2. There is also a fundamental trade-off in establishing the wholesale mark-up that will be retained by the Commonwealth. The higher the wholesale mark-up, the more revenue the Commonwealth will retain and deposit into the General Fund. Given that the VABC will continue to be the only available wholesaler, retailers will have to pay the mark-up regardless of the level, and they will have to either raise prices or reduce their assumed return on investment. If prices are materially increased, it is expected that consumers will, in some combination, reduce their consumption, substitute beer or wine for distilled spirits, or purchase out-of-state. If retailers reduce their expected rate of return on investment, the amount they will be willing (or able) to pay for a franchise will also be reduced. In some respects, it becomes a trade-off between one-time revenue for transportation (which would suggest a lower mark-up) and on-going revenue for the general fund (which would suggest a higher mark-up). Our recommendation, as noted in the model, is a level of mark-up that balances the need for on-going Revenue Neutrality with a desire to make franchises attractive enough to generate significant one-time revenue.
3. The process for implementing a new system will be labor-intensive, time consuming and, most likely, frustrating to all parties. It will require significant effort by public sector employees who are on the verge of losing their jobs, private sector businessmen and women who will have to adapt to a new set of rules and regulations, and state and local policymakers who may have divergent views on the advantages or disadvantages of a new system. To help ensure a smooth transition for consumers – and a reasonable return on investment for both the Commonwealth and its private partners, we would suggest that opportunities to expedite administrative processes, stage or phase in retail locations and transition current public store employees be considered. At the beginning, an expeditious process for conducting a franchise auction should be a key priority.
4. While beyond the scope of this study, the Commonwealth should also determine appropriate standards and benchmarks by which to judge the success of any privatization venture, clearly communicate those standards and benchmarks, and then gather, analyze and report on those performance measures on a regular basis.



Appendices

Appendices

Appendix A: Bibliography

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Appendix B: Technical Appendix

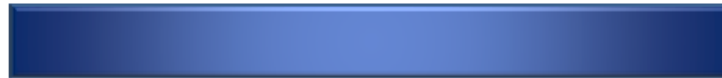


Virginia

VABC Privatization Model

1/5/2011

Quick Links





Model Contents

Model Tab	Quick Link
<i>Assumptions</i>	
<i>Charting</i>	
<i>Summary Table</i>	
<i>Gross Sales Calculations</i>	
<i>Volume</i>	
<i>Price</i>	
<i>Price Chart</i>	
<i>Cost of Transactions</i>	
<i>Service Cost Chart</i>	
<i>ABC Property Log</i>	
<i>Budget Neutrality Ongoing Agent New Table</i>	
<i>Budget Neutrality Ongoing License New Table</i>	
<i>Budget Neutrality Agent 2012 New Table</i>	
<i>Budget Neutrality License 2012 New Table</i>	
<i>Business Taxes</i>	
<i>Up-Front Payment Model</i>	



Model Assumptions

Model Color Coding	
BLUE	Number in the cell is a typed value
BLACK	Number in the cell is calculated by referring to the value of another cell (a reference)
TEAL	Number in the cell is calculated using a complex formula

General Assumptions	Input	Notes
Round_Millions	1,000,000	
Round		
Round		

Volumes Tab	Input	Notes
License Inflator 2012	5.0%	
Agent Inflator 2012	2.0%	
Wine Tax	4.0%	
VABC Gross	58.2%	
Cost of Goods DS	\$34.78	
Cost of Goods Other	\$13.25	

Gross Sales Collections Tab	Input	Notes
Excise Tax DS	20.0%	

Price Tab	Input	Notes
ABC Markup License	50.0%	
ABC Markup Agent	69.0%	
Retail Markup	15.1%	
Sales Tax License	4.0%	(@ 4/5 of 5%)

Price Tab	Input	Notes
Retail Sales Tax	5.0%	



Model Assumptions

ABC Property Tab	Input	Notes
Costs and Commissions	12.0%	
Up Front Payment Tab		
Low Volume	250.0	
High Volume	750.0	
% Available for Franchise Amortization	50.0%	
Assumed Interest Rate	8.0%	
Gross Profit Low Volume Percentage	25.0%	
Gross Profit High Volume Percentage	60.0%	
Business Taxes Tab		
ABC Net Profit Agent Model	50.0%	
Corporate Split	85.0%	
PIT Split	15.0%	
Corporate Tax	6.0%	
PIT Tax	4.11%	
Profitability Allowance	75.00%	
Cost of Transition Tab		
Agent Commissions	7.0%	
Warehouse & Transportation Costs	5,600,000	
ABC Admin Costs	1,000,000	
WTA Costs	7,165,129	
UI Costs	13,772,248	
ABC Private License Revenue	2,500,000	@ \$2,500 x 1,000
FY 2011 Store Operations Costs	86.1	

Summary Table

Overall Impact	
SFY 2012:	
License Approach	\$12.81
Agent Approach	\$37.16
Ongoing:	
License Approach	\$13.18
Agent Approach	\$39.71

Notes:

Numbers in millions

Gross Sales Calculations

ABC Gross Sales 2012 License Approach \$ in Millions												
Month #	ABC Store Operations	Private Licenses	ABC Store Retail Sales (NoT) ¹	ABC Store DS Excise Tax	ABC Store Sals W/ Excise Tax	ABC Store Wholesale Sales ²	ABC Total Gross Sales (NoT)	12 Month Total	ABC Store Cost of Goods	Licensee Cost of Goods	Total CoG Sold	12 Month Total CoG
1	100%	0%	\$47.66	\$9.41	\$57.07	\$0.00	\$47.66		\$27.76	\$0.00	\$27.76	
2	90%	10%	\$42.90	\$8.47	\$51.37	\$4.30	\$47.20		\$24.98	\$2.87	\$27.85	
3	80%	20%	\$38.13	\$7.53	\$45.66	\$8.61	\$46.74		\$22.21	\$5.74	\$27.95	
4	70%	30%	\$33.36	\$6.59	\$39.95	\$12.91	\$46.28		\$19.43	\$8.61	\$28.04	
5	60%	40%	\$28.60	\$5.65	\$34.24	\$17.22	\$45.81		\$16.66	\$11.48	\$28.13	
6	50%	50%	\$23.83	\$4.71	\$28.54	\$21.52	\$45.35		\$13.88	\$14.35	\$28.23	
7	40%	55%	\$19.06	\$3.76	\$22.83	\$23.67	\$42.74		\$11.10	\$15.78	\$26.89	
8	37%	60%	\$17.63	\$3.48	\$21.12	\$25.83	\$43.46		\$10.27	\$17.22	\$27.49	
9	35%	64%	\$16.68	\$3.29	\$19.98	\$27.55	\$44.23		\$9.72	\$18.36	\$28.08	
10	34%	67%	\$16.20	\$3.20	\$19.40	\$28.84	\$45.04		\$9.44	\$19.23	\$28.66	
11	31%	69%	\$14.78	\$2.92	\$17.69	\$29.70	\$44.47		\$8.61	\$19.80	\$28.40	
12	28%	72%	\$13.35	\$2.64	\$15.98	\$30.82	\$44.16	\$543.14	\$7.77	\$20.55	\$28.32	\$335.79
13	20%	80%	\$9.53	\$1.88	\$11.41	\$34.43	\$43.97		\$5.55	\$22.96	\$28.51	
14	20%	80%	\$9.53	\$1.88	\$11.41	\$34.43	\$43.97		\$5.55	\$22.96	\$28.51	
15	16%	83%	\$7.63	\$1.51	\$9.13	\$35.72	\$43.35		\$4.44	\$23.82	\$28.26	
16	11%	85%	\$5.24	\$1.04	\$6.28	\$36.59	\$41.83		\$3.05	\$24.39	\$27.44	
17	9%	90%	\$4.29	\$0.85	\$5.14	\$38.74	\$43.03		\$2.50	\$25.83	\$28.32	
18	7%	93%	\$3.34	\$0.66	\$4.00	\$40.03	\$43.37		\$1.94	\$26.69	\$28.63	

ABC Gross Sales 2012 Agent Approach \$ in Millions													
Month#	ABC Store Operations	Private Agents	ABC Store Retail Sales (NoT) ³	ABC Store DS Excise Tax	ABC Store Sales W/ Excise Tax	Agent Sales ⁴	Agent Sales w/ DS Excise Tax	ABC Total Gross Sales (NoT)	12 Month Total	ABC Store Cost of Goods	Agent Cost of Goods	Total CoG Sold	12 Month Total CoG
1	100%	0%	\$47.66	\$9.41	\$57.07	\$0.00	\$0.00	\$47.66		\$27.76	\$0.00	\$27.76	
2	80%	20%	\$38.13	\$7.53	\$45.66	\$9.51	\$11.41	\$47.64		\$22.21	\$5.57	\$27.78	
3	60%	40%	\$28.60	\$5.65	\$34.24	\$19.02	\$22.82	\$47.62		\$16.66	\$11.15	\$27.80	
4	40%	60%	\$19.06	\$3.76	\$22.83	\$28.53	\$34.23	\$47.59		\$11.10	\$16.72	\$27.83	
5	30%	70%	\$14.30	\$2.82	\$17.12	\$33.28	\$39.94	\$47.58		\$8.33	\$19.51	\$27.84	
6	25%	75%	\$11.92	\$2.35	\$14.27	\$35.66	\$42.79	\$47.58		\$6.94	\$20.91	\$27.85	
7	20%	80%	\$9.53	\$1.88	\$11.41	\$38.04	\$45.64	\$47.57		\$5.55	\$22.30	\$27.85	
8	15%	85%	\$7.15	\$1.41	\$8.56	\$40.41	\$48.50	\$47.56		\$4.16	\$23.69	\$27.86	
9	10%	90%	\$4.77	\$0.94	\$5.71	\$42.79	\$51.35	\$47.56		\$2.78	\$25.09	\$27.86	
10	9%	91%	\$4.29	\$0.85	\$5.14	\$43.27	\$51.92	\$47.56		\$2.50	\$25.37	\$27.86	
11	8%	92%	\$3.81	\$0.75	\$4.57	\$43.74	\$52.49	\$47.56		\$2.22	\$25.64	\$27.87	
12	7%	93%	\$3.34	\$0.66	\$4.00	\$44.22	\$53.06	\$47.55	\$571.02	\$1.94	\$25.92	\$27.87	\$334.03
13	6%	94%	\$2.86	\$0.56	\$3.42	\$44.69	\$53.63	\$47.55		\$1.67	\$26.20	\$27.87	
14	5%	95%	\$2.38	\$0.47	\$2.85	\$45.17	\$54.20	\$47.55		\$1.39	\$26.48	\$27.87	
15	4%	96%	\$1.91	\$0.38	\$2.28	\$45.64	\$54.77	\$47.55		\$1.11	\$26.76	\$27.87	
16	3%	97%	\$1.43	\$0.28	\$1.71	\$46.12	\$55.34	\$47.55		\$0.83	\$27.04	\$27.87	
17	2%	98%	\$0.95	\$0.19	\$1.14	\$46.60	\$55.91	\$47.55		\$0.56	\$27.32	\$27.87	
18	1%	99%	\$0.48	\$0.09	\$0.57	\$47.07	\$56.48	\$47.55		\$0.28	\$27.60	\$27.87	

Notes:

1. DS, Wine, Other @ 2010 Vol
2. DS Only @ 5% Vol. Growth
3. DS, Wine, Other @ 2010 Vol
4. DS Only @ 2% Vol. Growth



Volumes

Sales of All Beverages: State Store Sales- Fiscal Year 2011 (ABC Estimate as of 12/07/2011)

Category	Gallons*	Liters	Percent of Total Gallons	Gross Dollars	Privatization Plan 2011 Store Baseline	Privatization Plan 2011 Licensee Baseline	2012 License Volume	2012 Agent Volume
Distilled Spirits	9,428,899	36,213,978	96.0%	\$677,649,869	9,428,899	9,428,899	9,900,344	9,617,477
Virginia Wine	28,506	109,484	0.3%	\$1,553,961	28,506	0	0	0
Vermouth	38,697	148,627	0.4%	\$1,342,466	38,697	0	0	0
Alcohol	110	411	0.0%	\$7,865	110	0	0	0
Non-Alcoholic Mixers	322,444	1,238,426	3.3%	\$4,445,839	322,444	0	0	0
Total	9,818,657	37,710,925	100.0%	\$685,000,000	9,818,657	9,428,899	9,900,344	9,617,477

DS Excise Tax \$113,000,000

Wine Tax \$62,158

Gross NoT \$571,937,842 Note: This formula was adjusted to account for total sales, not just spirits

VABC Gross (GF) \$332,867,824

Less DS \$327,937,120

Cost Other \$5,164,289

Cost of Goods \$333,101,409

DS Gross Sales (NoT) \$564,649,869

Price Model

Sales Calculations: License Approach	
Total Distilled Spirits Volume (m.gals)	9.9003
Cost Per Gallon	\$34.78
Total Cost of Product	\$344.33
ABC Mark-up	\$172.17
ABC Wholesale Cost w/o Taxes	\$516.50
D.S. Excise Tax	\$103.30
ABC Gross Wholesale Sales	\$619.80
Retail Mark-up*	\$77.99
Retail Gross Sales w/o Taxes	\$697.79
Sales Tax	\$27.91
Gross Retail Price	\$725.70

Sales Calculations: Agent Approach		
	Agents	Stores (2011)
Total Distilled Spirits Volume (m.gals)	9.6175	9.4289
Cost Per Gallon	\$34.78	\$34.78
Total Cost of Product	\$334.50	\$327.94
Handling and Rounding	\$5.26	\$5.15
ABC Mark-up @ 69%	\$234.43	\$226.28
ABC Retail Price w/o Taxes	<u>\$574.18</u>	<u>\$559.37</u>
D.S. Excise Tax	\$114.84	\$111.87
ABC Gross Retail Sales	\$689.02	\$671.24
Total NON-DS		
Non-DS Volume	N/A	0.3898
Cost Per Gallon	\$0.00	\$13.25
Total Cost of Products	\$0.00	\$5.16
Total Cost of Goods Sold	\$334.50	\$333.10

Notes:

Numbers are in millions

*Mark-up is on the product price, not the Excise Tax

Price Chart Model

Estimated Current Average Cost per Gallon	
Total Cost of Goods	\$34.78
Handling and Rounding	\$0.55
VA ABC Markup	24.00
State Excise Tax	11.86
Total Price of Goods	\$71.19
Retail Sales Tax	3.56
Total Cost to Customer	\$74.75

Wholesale Price NoT	\$59.32
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Projected Average per Cost Gallon	
Total Cost of Goods	\$34.78
Handling and Rounding	-
Wholesale Markup	\$17.39
Wholesale Price	\$52.17
State Excise Tax	\$10.43
Total Wholesale Price of Goods	\$62.60
Retail Markup*	7.88
Total Retail Price per Gallon	\$70.48
Retail Sales Tax	3.52
Total Cost to Customer	\$74.01

*Mark-up is on the product price, not the Excise Tax

Handling and Rounding	
Handling	
Handling Per Case	\$1.00
Gallons Per Case	2.3775
Handling Per Gallon	\$0.42
Rounding	
Max Rounding per bottle	0.0499
Average bottles/Case	12
Max Rounding per case	0.5988
Gallons Per Case	2.3775
Max Rounding/Gallon	0.2519
Max. Ex Tax Rounding/Case	0.5988
Total Max Rounding/Gallon	0.2519
Mid-Point of Rounding/Gallon	0.1259
Handling Per Gallon	\$0.42
Total Handling and Rounding	\$0.55

Cost of Transition

ABC Agency Transition Costs ¹											
(Operating Costs + Severance Costs + Warehouse and Admin. + Agent Commission)											
Month #	ABC Store Operations	Private Agents	ABC Store Operations	7% Agent Commission ²	Warehouse Cost	ABC Admin. Cost	Operations Totals	WTA Cost	UI Cost ³	Total Cost	SFY 2012 Cost
1	100%	0%	\$7.1750	\$0.0000	\$0.467	\$0.083	\$7.7250	\$0.000	\$0.000	\$7.7250	
2	80%	20%	\$5.7400	\$0.8039	\$0.467	\$0.083	\$6.2900	\$1.433	\$2.754	\$10.4775	
3	60%	40%	\$4.3050	\$1.6077	\$0.467	\$0.083	\$4.8550	\$2.866	\$5.509	\$13.2300	
4	40%	60%	\$2.8700	\$2.4116	\$0.467	\$0.083	\$3.4200	\$4.299	\$8.263	\$15.9824	
5	30%	70%	\$2.1525	\$2.8135	\$0.467	\$0.083	\$2.7025	\$5.016	\$9.641	\$17.3587	
6	25%	75%	\$1.7938	\$3.0145	\$0.467	\$0.083	\$2.3438	\$5.374	\$10.329	\$18.0468	
7	20%	80%	\$1.4350	\$3.2154	\$0.467	\$0.083	\$1.9850	\$5.732	\$11.018	\$18.7349	
8	15%	85%	\$1.0763	\$3.4164	\$0.467	\$0.083	\$1.6263	\$6.090	\$11.706	\$19.4230	
9	10%	90%	\$0.7175	\$3.6173	\$0.467	\$0.083	\$1.2675	\$6.449	\$12.395	\$20.1111	
10	9%	91%	\$0.6458	\$3.6575	\$0.467	\$0.083	\$1.1958	\$6.520	\$12.533	\$20.2488	
11	8%	92%	\$0.5740	\$3.6977	\$0.467	\$0.083	\$1.1240	\$6.592	\$12.670	\$20.3864	
12	7%	93%	\$0.5023	\$3.7379	\$0.467	\$0.083	\$1.0523	\$6.664	\$12.808	\$20.5240	\$35.59
13	6%	94%	\$0.4305	\$3.7781	\$0.467	\$0.083	\$0.9805	\$6.735	\$12.946	\$20.6616	
14	5%	95%	\$0.3588	\$3.8183	\$0.467	\$0.083	\$0.9088	\$6.807	\$13.084	\$20.7993	
15	4%	96%	\$0.2870	\$3.8585	\$0.467	\$0.083	\$0.8370	\$6.879	\$13.221	\$20.9369	
16	3%	97%	\$0.2153	\$3.8987	\$0.467	\$0.083	\$0.7653	\$6.950	\$13.359	\$21.0745	
17	2%	98%	\$0.1435	\$3.9389	\$0.467	\$0.083	\$0.6935	\$7.022	\$13.497	\$21.2121	
18	1%	99%	\$0.0718	\$3.9791	\$0.467	\$0.083	\$0.6218	\$7.093	\$13.635	\$21.3498	

Cost of Transition

ABC License Transition Costs ¹														
(Operating Costs + Severance Costs + Warehouse and Admin. - License Revenue)														
Month #	ABC Store Operations	Private Licenses	ABC Store Operations	Warehse. Cost	ABC Admin. Cost	Totals	WTA Cost	UI Cost ³	Total Cost	Private Licenses	Costs Less Lic. Fees	SFY 2012 Cost	Totals	SFY Cost
1	100%	0%	\$7.175	\$0.467	\$0.083	\$7.72500	\$0.000	\$0.000	\$7.7250	\$0.000	\$7.7250		\$7.18	
2	90%	10%	\$6.458	\$0.467	\$0.083	\$7.00750	\$0.717	\$1.377	\$9.1012	\$0.250	\$8.8512		\$8.30	
3	80%	20%	\$5.740	\$0.467	\$0.083	\$6.29000	\$1.433	\$2.754	\$10.4775	\$0.500	\$9.9775		\$9.43	
4	70%	30%	\$5.023	\$0.467	\$0.083	\$5.57250	\$2.150	\$4.132	\$11.8537	\$0.750	\$11.1037		\$10.55	
5	60%	40%	\$4.305	\$0.467	\$0.083	\$4.85500	\$2.866	\$5.509	\$13.2300	\$1.000	\$12.2300		\$11.68	
6	50%	50%	\$3.588	\$0.467	\$0.083	\$4.13750	\$3.583	\$6.886	\$14.6062	\$1.250	\$13.3562		\$12.81	
7	45%	55%	\$3.229	\$0.467	\$0.083	\$3.77875	\$3.941	\$7.575	\$15.2943	\$1.375	\$13.9193		\$13.37	
8	40%	60%	\$2.870	\$0.467	\$0.083	\$3.42000	\$4.299	\$8.263	\$15.9824	\$1.500	\$14.4824		\$13.93	
9	36%	64%	\$2.583	\$0.467	\$0.083	\$3.13300	\$4.586	\$8.814	\$16.5329	\$1.600	\$14.9329		\$14.38	
10	33%	67%	\$2.368	\$0.467	\$0.083	\$2.91775	\$4.801	\$9.227	\$16.9458	\$1.675	\$15.2708		\$14.72	
11	31%	69%	\$2.224	\$0.467	\$0.083	\$2.77425	\$4.944	\$9.503	\$17.2210	\$1.725	\$15.4960		\$14.95	
12	28%	72%	\$2.038	\$0.467	\$0.083	\$2.58770	\$5.130	\$9.861	\$17.5789	\$1.790	\$15.7889	\$54.20	\$15.24	\$12.21
13	20%	80%	\$1.435	\$0.467	\$0.083	\$1.98500	\$5.732	\$11.018	\$18.7349	\$2.000	\$16.7349		\$16.18	
14	20%	80%	\$1.435	\$0.467	\$0.083	\$1.98500	\$5.732	\$11.018	\$18.7349	\$2.000	\$16.7349		\$16.18	
15	17%	83%	\$1.220	\$0.467	\$0.083	\$1.76975	\$5.947	\$11.431	\$19.1478	\$2.075	\$17.0728		\$16.52	
16	15%	85%	\$1.076	\$0.467	\$0.083	\$1.62625	\$6.090	\$11.706	\$19.4230	\$2.125	\$17.2980		\$16.75	
17	10%	90%	\$0.718	\$0.467	\$0.083	\$1.26750	\$6.449	\$12.395	\$20.1111	\$2.250	\$17.8611		\$17.31	
18	7%	93%	\$0.502	\$0.467	\$0.083	\$1.05225	\$6.664	\$12.808	\$20.5240	\$2.325	\$18.1990		\$17.65	

Notes:

1. Numbers in Millions
2. Agent Approach will yield \$31.99 million in agent commissions (@7%) in 2012
3. Less \$1.292m for 100 early retirements

Severance Cost Chart

DABC Retail Store Employees: Estimated Cost of Severance

Employee Type	Number of Employees	WTA Benefit	Maximum U.I.*	Annual Leave	Sick Leave	Life Insurance	Health Insurance	Totals
Full Time Classified	591	\$7,165,129	\$5,490,716	\$1,684,470	\$380,347	\$202,469	\$4,893,636	\$19,816,767
Part-Time	1,500		\$8,281,532					\$8,281,532
Total	2,091	\$7,165,129	\$13,772,248	\$1,684,470	\$380,347	\$202,469	\$4,893,636	\$28,098,299

Notes:

*Less \$1.292m for 100 Early Retirement

ABC Property Data

ABC Owned Properties (current assessed values)				
#	Store #	Store Location	Assessed Value	Notes
1	117	Lynchburg	\$635,000	
2	119	Alexandria	\$10,734,182	Under contract for sale
3	121	Fredericksburg	\$374,200	
4	122	Staunton (n/a)	\$265,000	Substituted Christiansburg
5	145	Harrisonburg	\$640,900	
6	165	Chesapeake	\$232,000	
7	181	Middleburg	\$742,700	
8	187	Richmond	\$367,000	
9	195	Christiansburg	\$265,000	
10	201	Abingdon (n/a)	\$265,000	Substituted Christiansburg
11	206	Big Stone Gap	\$181,000	
12	227	Gordonsville	\$97,400	
13	236	Annandale	\$1,051,810	Also contains enforcement office. Sell and Rent 5,000 sq. ft
14	244	Hampton	\$929,600	Also contains enforcement office. Sell and Rent 5,000 sq. ft
15	280	Chesapeake	\$1,914,100	
16	293	Mount Jackson	\$97,400	Substituted Gordonsville
17	350	Chesterfield	\$437,000	
18	360	Richmond	\$0	Store is physically attached to warehouse
		Total	\$19,229,292	
			(\$2,307,515)	Less costs and commissions (12%)
			\$16,921,777	
			\$0	Round down for market risk
		Net Asset Value	\$16,921,777	

Source: DABC Chief Financial Officer



Ongoing Budget Neutrality Agent Approach (\$ in millions)			
	Actual FY2010	Budget FY2011	Privatization PLAN
Sources			
General Fund Revenue:			
Spirits Excise Tax	\$111.30	\$113.00	\$114.11 Assumes 9.617M gals
Wine Excise Tax	\$20.30	\$20.00	\$20.00 Assumes no change
Malt Beverage Tax	\$43.50	\$43.40	\$43.40 Assumes no change
Retail Sales Tax	\$26.90	\$25.60	\$27.39 Assumes 9.617M gals
Business Tax	\$0.00	\$0.00	\$0.34 Full Value
Subtotal	\$202.00	\$202.00	\$205.24
Non-General Fund Revenue:			
Wine Excise Tax for BH/DS (Part 3)	\$9.90	\$9.10	\$9.10 Assumes no change
License Tax (NGF)	\$11.10	\$10.70	\$10.70 Assumes no change
Miscellaneous Revenue	\$6.20	\$6.20	\$6.20 Assumes no change
Total NGF:	\$27.20	\$26.00	\$26.00
ABC Gross Sales:	\$564.10	\$571.94	\$574.18 Assumes phases volume and loss of wine/mixers
Total All Funds Sources:	\$793.30	\$799.94	\$805.42
Uses:			
ABC Operations:			
Existing Enforcement Costs	\$13.90	\$14.00	\$14.00 Excludes seized assets
Technology-VITA	\$14.70	\$17.60	\$10.00 Store IT Phased out.
Board and Hearings Costs	\$3.80	\$3.80	\$3.80 Assumes no change
Office Space Costs	\$1.70	\$1.70	\$1.70 Assumes no change
Other Miscellaneous Expenses	\$8.50	\$11.50	\$11.50 Appraisals, Litigation, Advertising
Store Operations	\$83.90	\$85.30	\$0.00 Stores closed
Agent Commissions	\$0.00	\$0.00	\$48.23 Assumed 7% on
ABC Efficiencies	(\$1.60)	(\$1.60)	\$0.00 Stores closed
Warehouse Operations/Transportation	\$9.90	\$9.90	\$9.90 Assumes no change
Sub-Total	\$134.80	\$142.20	\$99.13
Cost of Goods	\$329.60	\$333.10	\$334.50 Price B8
Cost of Conversion:			
Administrative Costs	\$0.00	\$0.00	\$0.00 Hearings, Investigations, Logistics
Liquidate ABC Owned Stores	\$0.00	\$0.00	\$0.00 Net Sale of Real Estate
ABC Rental	\$0.00	\$0.00	\$0.15 Rental Space in Annondale and Hampton for Enforcement
Severance/Closure	\$0.00	\$0.00	\$0.00 WTA, UI, Etc.
Warehouse/Transportation	\$0.00	\$0.00	\$5.60 Warehouse Extra Shifts and Trucks
Subtotal	\$464.40	\$475.30	\$340.25
Net Revenue From Operations:	\$99.70	\$96.64	\$233.94
Additional 22 Officers	\$0.00	\$0.00	\$1.70 Per DPB assumed to be full-year
Total Other Costs	\$0.00	\$0.00	\$1.70
Total All Funds Uses:	\$464.40	\$475.30	\$441.08
Net Surplus (Sources-Uses):	\$328.90	\$324.64	\$364.34
			\$39.71



Ongoing Budget Neutrality License Approach (\$ in millions)			
	Actual FY2010	Budget ¹ FY2011	Privatization PLAN
Assumptions			
Sources			
General Fund Revenue:			
Spirits Excise Tax	\$111.30	\$113.00	\$103.30 Assumes 9,900M gals @ 20% ExT on Wholesale
Wine Excise Tax	\$20.30	\$20.00	\$20.00 Assumes no change
Malt Beverage Tax	\$43.50	\$43.40	\$43.40 Assumes no change
Retail Sales Tax	\$26.90	\$25.60	\$28.19 Assumes 9,900M gals.
Business Tax	\$0.00	\$0.00	\$0.61 Full Value
Subtotal	\$202.00	\$202.00	\$195.50
Non-General Fund Revenue			
Wine Excise Tax for BH/DS (Part 3)	\$9.90	\$9.10	\$9.10 Assumes no change
License Tax (NGF)	\$11.10	\$10.70	\$10.70 Assumes no change
New Spirit Retail Licenses	\$0.00	\$0.00	\$2.50 All 1,000 @ \$2,500/yr.
Miscellaneous Revenue	\$6.20	\$6.20	\$6.20 Assumes no change
Total NGF:	\$27.20	\$26.00	\$28.50
ABC Gross Sales:	\$564.10	\$571.94	\$516.50 Assumes full wholesale of 10.45 m gallons
Total All Funds Sources:	\$793.30	\$799.94	\$740.50
Uses			
ABC Operations:			
Existing Enforcement Costs	\$13.90	\$14.00	\$14.00 Excludes Seized Assets
Technology-VITA	\$14.70	\$17.60	\$10.00 Store IT Phased out.
Board and Hearings Costs	\$3.80	\$3.80	\$3.80 Assumes no change
Office Space Costs	\$1.70	\$1.70	\$1.70 Assumes no change
Other Miscellaneous Expenses	\$8.50	\$11.50	\$11.50 Appraisals, Litigation, Advertising
Store Operations	\$83.90	\$85.30	\$0.00 Stores closed
ABC Efficiencies	(\$1.60)	(\$1.60)	\$0.00 Stores closed
Warehouse Operations/Transportation	\$9.90	\$9.90	\$9.90 Assumes no change
Sub-Total	\$134.80	\$142.20	\$50.90
Cost of Goods	\$329.60	\$333.10	\$344.33
Cost of Conversion:			
Administrative Costs	\$0.00	\$0.00	\$0.00 Stores closed
Liquidate ABC Owned Stores	\$0.00	\$0.00	\$0.00 Stores closed
ABC Rental	\$0.00	\$0.00	\$0.15 Rental Space in Annondale and Hampton for Enforcement
Severance/Closure	\$0.00	\$0.00	\$0.00 Stores closed
Warehouse and Distribution	\$0.00	\$0.00	\$5.60 Warehouse Extra Shifts and Trucks
Subtotal	\$329.60	\$333.10	\$350.08
Net Revenue From Operations:	\$99.70	\$96.64	\$115.52
Additional 22 Officers	\$0.00	\$0.00	\$1.70 Per DPB assumed to be full-year
Total Other Costs	\$0.00	\$0.00	\$1.70
Total All Funds Uses:	\$464.40	\$475.30	\$402.68
Net Surplus (Sources-Uses):	\$328.90	\$324.64	\$337.82
			\$13.18



SFY 2012 Budget Neutrality Agent Approach (\$ in millions)				
	Actual FY2010	Budget ^a FY2011	Privatization PLAN	Assumptions
Sources				
General Fund Revenue:				
Spirits Excise Tax	\$111.30	\$113.00	\$114.11	Assumes 9,758 m gals
Wine Excise Tax	\$20.30	\$20.00	\$20.00	Assumes no change
Malt Beverage Tax	\$43.50	\$43.40	\$43.40	Assumes no change
Retail Sales Tax	\$26.90	\$25.60	\$27.39	Assumes 9,758 m gals
Business Tax	\$0.00	\$0.00	\$0.32	Assumes 93% phase in
Subtotal	\$202.00	\$202.00	\$205.22	
Non-General Fund Revenue:				
Wine Excise Tax for BH/DS (Part 3)	\$9.90	\$9.10	\$9.10	Assumes no change
License Tax (NGF)	\$11.10	\$10.70	\$10.70	Assumes no change
Miscellaneous Revenue	\$6.20	\$6.20	\$6.20	Assumes no change
Total NGF:	\$27.20	\$26.00	\$26.00	
ABC Gross Sales:	\$564.10	\$571.94	\$571.02	
Total All Funds Sources:	\$793.30	\$799.94	\$802.24	
Uses:				
ABC Operations:				
Existing Enforcement Costs	\$13.90	\$14.00	\$14.00	Excludes seized assets
Technology-VITA	\$14.70	\$17.60	\$13.00	Assumed 70% Store IT Phased out.
Board and Hearings Costs	\$3.80	\$3.80	\$3.80	Assumes no change
Office Space Costs	\$1.70	\$1.70	\$1.70	Assumes no change
Other Miscellaneous Expenses	\$8.50	\$11.50	\$11.50	Appraisals, Litigation, Advertising
Store Operations	\$83.90	\$85.30	\$35.59	Store Phase out costs Plus Warehouse and Admin
Agent Commissions	\$0.00	\$0.00	\$31.99	Phase-in
ABC Efficiencies	(\$1.60)	(\$1.60)	\$0.00	Assumes no change
Warehouse Operations/Transportation	\$9.90	\$9.90	\$9.90	Assumes no change
Sub-Total	\$134.80	\$142.20	\$121.48	
Cost of Goods	\$329.60	\$333.10	\$334.03	
Cost of Conversion:				
Administrative Costs	\$0.00	\$0.00	\$0.00	Extra Hearings, Investigations. Logistics are one-time
Liquidate ABC Owned Stores	\$0.00	\$0.00	(\$16.92)	Net Sale of Real Estate
ABC Rental	\$0.00	\$0.00	\$0.15	Rental Space in Annondale and Hampton for Enforcement
Severance/Closure	\$0.00	\$0.00	\$0.00	WTA, UI, Etc. are one-time
Warehouse/Transportation	\$0.00	\$0.00	\$0.00	Are shown in Store Operations during Transition
Subtotal	\$464.40	\$475.30	\$317.25	
Net Revenue From Operations:	\$99.70	\$96.64	\$253.77	
Additional 22 Officers	\$0.00	\$0.00	\$1.70	Per DPB assumed to be full-year
Total Other Costs	\$0.00	\$0.00	\$1.70	
Total All Funds Uses:	\$464.40	\$475.30	\$440.43	
Net Surplus (Sources-Uses):	\$328.90	\$324.64	\$361.80	\$37.16
Notes:				
One-Time Costs:				
WTA and UI costs	\$10.00 to \$30.00			
VABC 1-time Admin Workload	\$1.00			
Liquidation of Fixtures	(\$1.00)			
Redemption of Gift Cards	\$0.00			
POS Write-off	\$0.00			
	Money is escrowed			
	Not a cash transaction			



SFY 2012 Budget Neutrality License Approach (\$ in millions)				
	Actual FY2010	Budget ^a FY2011	Privatization PLAN	Assumptions
Sources:				
General Fund Revenue:				
Spirits Excise Tax	\$111.30	\$113.00	\$103.30	Assumes 9,900 m gals @ 20% ExT on Wholesale
Wine Excise Tax	\$20.30	\$20.00	\$20.00	Assumes no change
Malt Beverage Tax	\$43.50	\$43.40	\$43.40	Assumes no change
Retail Sales Tax	\$26.90	\$25.60	\$28.19	Assumes 9,900 m gals.
Business Tax	\$0.00	\$0.00	\$0.44	Assumes 73% Phase in
Subtotal	\$202.00	\$202.00	\$195.33	
Non-General Fund Revenue:				
Wine Excise Tax for BH/DS (Part 3)	\$9.90	\$9.10	\$9.10	Assumes no change
License Tax (NGF)	\$11.10	\$10.70	\$10.70	Assumes no change
New Spirit Retail Licenses	\$0.00	\$0.00	\$1.79	1,000 @ \$2,500/yr. phased in
Miscellaneous Revenue	\$6.20	\$6.20	\$6.20	Assumes no change
Total NGF:	\$27.20	\$26.00	\$27.79	
ABC Gross Sales:	\$564.10	\$571.94	\$543.14	Assumes Phase-in from Lic. Gross Sales Tab
Total All Funds Sources:	\$793.30	\$799.94	\$766.26	
Uses:				
ABC Operations:				
Existing Enforcement Costs	\$13.90	\$14.00	\$14.00	Excludes Seized Assets
Technology-VITA	\$14.70	\$17.60	\$13.00	Assumed 70% Store IT Phased out.
Board and Hearings Costs	\$3.80	\$3.80	\$3.80	Assumes no change
Office Space Costs	\$1.70	\$1.70	\$1.70	Assumes no change
Other Miscellaneous Expenses	\$8.50	\$11.50	\$11.50	Appraisals, Litigation, Advertising
Store Operations	\$83.90	\$85.30	\$54.20	Store Phase out costs Plus Warehouse and Admin
ABC Efficiencies	(\$1.60)	(\$1.60)	\$0.00	Assumes no store efficiencies during transition
Warehouse Operations/Transportation	\$9.90	\$9.90	\$9.90	Assumes no change
Sub-Total	\$134.80	\$142.20	\$108.10	
Cost of Goods	\$329.60	\$333.10	\$335.79	
Cost of Conversion:				
Administrative Costs	\$0.00	\$0.00	\$0.00	Extra Hearings, Investigations. Logistics are one-time
Liquidate ABC Owned Stores	\$0.00	\$0.00	(\$16.92)	Net Sale of Real Estate
ABC Rental	\$0.00	\$0.00	\$0.15	Rental Space in Annondale and Hampton for Enforcement
Severance/Closure	\$0.00	\$0.00	\$0.00	WTA, UI, Etc. are one-time
Warehouse and Distribution	\$0.00	\$0.00	\$0.00	Are shown in Store Operations during Transition
Subtotal	\$329.60	\$333.10	\$319.02	
Net Revenue From Operations:	\$234.50	\$238.84	\$224.12	
Additional 22 Officers	\$0.00	\$0.00	\$1.70	Per DPB assumed to be full-year
Total Other Costs	\$0.00	\$0.00	\$1.70	
Total All Funds Uses:	\$464.40	\$475.30	\$428.82	
Net Surplus (Sources-Uses):	\$328.90	\$324.64	\$337.44	\$12.81

Notes:**One-Time Costs:**

WTA and UI costs	\$10.00 to \$30.00	
VABC 1-time Admin Workload	\$1.00	
Liquidation of Fixtures	(\$1.00)	
Redemption of Gift Cards	\$0.00	Money is escrowed
POS Write-off	\$0.00	Not a cash transaction

Business Tax Model

Total Net Profit	
License	
High-Volume	\$39,775,739
Low-Volume	\$2,924,687
Total	\$42,700,426
Agent	
Total Commission @ 7%	\$47,926,556
50% Net Profit	\$23,963,278

License Approach			
Item	Totals	Corp. Tax	P.I.T.
Total Net Profit:	\$42,700,426		
Corp/PIT Split		\$36,295,362	\$6,405,064
Corp Tax		\$2,177,722	
PIT Tax			\$263,248
Total Business Tax Liability:	\$2,440,970		
Profitability Allowance (@75% Disc.)	\$1,830,727		
Estimated Tax Benefit:	\$610,242		

Agent Approach			
Item	Totals	Corp. Tax	P.I.T.
Total Net Profit:	\$23,963,278		
Corp/PIT Split (@ 85/15)		\$20,368,786	\$3,594,492
Corp Tax at 6.0%		\$1,222,127	
PIT Tax @ 4.11%			\$147,734
Total Business Tax Liability:	\$1,369,861		
Profitability Allowance (@75% Disc.)	\$1,027,396		
Estimated Tax Benefit:	\$342,465		



Up Front Payment Model

Retail License Bid Estimate	High Volume Licensees	Low Volume Licensees	Notes
Wholesale Price (NoExT)	\$52.17	\$52.17	
Implied Retail Mark-up Excl. Tax	15.1%	15.1%	
Volume in Gallons (Millions)	9,900,344	9,900,344	
Implied Mark up per gallon	\$7.88	\$7.88	
Gallons Per Case	2,37755	2,37755	
Implied Mark-up Per Case	\$18.73	\$18.73	
Estimated cases sold	4,719	2,498	
Implied Mark-up (Millions)	\$88,390.53	\$46,794.99	
Cost of Operation			
Payroll	\$20,000.00	\$22,000.00	Includes all benefits
Space (Lease, part-store allocation, etc)	\$5,500.00	\$5,000.00	Includes util., ins., p/r, taxes, etc.
Loss Allowance	\$2,500.00	\$1,000.00	
Overhead	\$1,000.00	\$1,000.00	Includes advertising & admin
Other Taxes	\$4,000.00	\$2,000.00	
Other	\$1,000.00	\$1,000.00	
Total Operating Costs	\$34,000.00	\$32,000.00	
Implied Net Profit	\$53,034.32	\$11,698.75	

Resulting Franchise Leverage (High Volume):	Annual	Total Payments	Net Present Value	x 750 Licenses
5 Years	\$26,517	\$132,586	\$122,765	\$92,073,471
10 Years	\$26,517	\$265,172	\$245,529	\$184,146,941
15 Years	\$26,517	\$397,757	\$368,294	\$276,220,412
20 Years	\$26,517	\$530,343	\$491,059	\$368,293,882
Resulting Franchise Leverage (Low Volume):	Annual	Total Payments	Net Present Value	x 250 Licenses
5 Years	\$5,849	\$29,247	\$27,080	\$6,770,108
10 Years	\$5,849	\$58,494	\$54,161	\$13,540,216
15 Years	\$5,849	\$87,741	\$81,241	\$20,310,324
20 Years	\$5,849	\$116,987	\$108,322	\$27,080,433

Total Estimated Valuation @ 5 years	\$98,843,579
Total Estimated Valuation @ 10 years	\$197,687,157
Total Estimated Valuation @ 15 years	\$296,530,736
Total Estimated Valuation @ 20 years	\$395,374,315

Largest 375 High-Volume Retailers @ 20 years	\$184,146,941
Next Largest 200 High-Volume Retailers @ 15 years	\$73,658,776
Smallest 175 High-Volume Retailers @ 10 years	\$42,967,620
Largest 150 Low-Volume Retailers @ 10 years	\$8,124,130
Smallest 100 Low-Volume Retailers @ 5 years	\$2,708,043
Total	\$311,605,510